HERITAGE OF VALUE, ARCHAEOLOGY OF RENOWN

Reshaping Archaeological Assessment and Significance

Edited by
Clay Mathers,
Timothy Darvill,
and Barbara J. Little

Heritage of Value, Archaeology of Renown

Cultural Heritage Studies

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Reshaping Archaeological Assessment and Significance

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To Bill and Teg, whose significance remains in our hearts, and to Susan and Dorothy for their enduring support, good humor, and cups of tea.
Clay Mathers

In memory of Dorothy A. Humpf
Barbara J. Little

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Foreword

Valuing Heritage and the Heritage of Value

I am delighted that *Heritage of Value, Archaeology of Renown: Reshaping Archaeological Assessment and Significance* is the inaugural volume for the Cultural Heritage Studies series. The topics discussed in this book are exciting and relevant issues to scholars and land managers who deal with the meaning of archaeological heritage and broader cultural heritage issues. The volume is about understanding the treatment and interpretation of archaeological heritage, and it deals with issues related to cultural identities, the creation of official memories, land ownership, repatriation, and protection of cultural heritage—all are important concerns that have global applicability. This volume, I believe, will stir new discussions on a variety of heritage issues that are critical to management, preservation, protection, and research strategies related to cultural resources.

Transformations of the world's political economy over the past century have threatened those vital senses of place and identity. In recent years, many of the efforts to conserve heritage resources have been expressed in terms of "heritage development." A significant number of public and private initiatives have begun to increase our awareness of the importance of sustaining locality and encouraging diversity in the face of increased pressures toward globalization and homogenization. The recovery, celebration, and interpretation of the past are necessary components of sustaining local identity and sense of place.

Heritage connotes integrity, authenticity, venerability, and stability, and it clarifies pasts so that they can be used in the present (Lowenthal 1997). However, the celebration of heritage often comes at a cost. With the increased interest and the new infusion of monies into heritage development, there are always tradeoffs that have social, political, and economic implications. The question that often arises is, "Which heritage is best to preserve, and will the promotion of heritage have an impact on the local cultural resources, the community, and the environment?" For instance, the celebration of heritage may provide a boost to the local economy, but at present there is too little understanding of this economic impact. Another question worth asking is whether the quality of life really increases for indigenous groups with the promotion of heritage, or do they still receive relatively low wages as they enter a new form of economy—the service industry. In other words, while heritage development has shown to be a vital part of any

community's self identity, as practitioners we need to be careful about how the public presentation of a group's heritage, whether created or transformed, will change lifestyles and perceptions of self and others (Chambers 2004).

Heritage is based on a shared value system that people have about culture and their past. Historian Eric Hobsbawm (1983: 13) writes, "The history which became part of the fund of knowledge or the ideology of nation, state or movement is not what has actually been preserved in popular memory, but what has been selected, written, pictured, popularized and institutionalized by those whose function it is to do so." Traditions, meanings, and memories are invented, and they become legitimate through repetition or a process of formalization and ritualization characterized by reference to the past. By implying continuity with the past, and sometimes that is a matter of forgetting a past or reinventing a collective memory, these traditions reinforce values and behavior (Hobsbawm 1983: 1–5).

Heritage of Value, Archaeology of Renown takes great strides to provide a very broad definition of heritage. It includes sacred natural places, historic woodlands, battlefields, trails, and other historic and prehistoric sites. Archaeologists are increasingly incorporating the ideas of groups that have not been traditionally recognized in the decision-making process, and the indigenous view of cultural heritage is discussed in several chapters. The authors embrace the opportunity to reflect on how they are connected to the cultures and communities in which they exist. Archaeologists are in a good place to address these changing perspectives, and they need to respond effectively to these challenges and opportunities.

The study of heritage is an emerging field, and there is a clear need for research devoted to understanding the cultural characteristics of heritage and its uses. It is critical that this research be formulated in such a way that it can be readily applied by those who are responsible for the management of our historic, cultural, and environmental resources, as well as contribute to an increased public awareness of the need for responsible heritage development. *Heritage of Value, Archaeology of Renown* introduces new approaches to assessing archaeological value and significance and promises to make important contributions to heritage policies with global applications.

Paul A. Shackel, Series Editor
University of Maryland

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Preface and Acknowledgments

In origin, most of the contributions to this volume derive from a session held at the Annual Meeting of the Theoretical Archaeology Group at Bournemouth University, December 16–18, 1997, and later repeated on the other side of the Atlantic at a session of the 63rd Annual Meeting of the Society for American Archaeology in Seattle, March 25–29, 1998. Not all the papers were presented at these meetings, and we would like to thank the additional contributors whose papers we have included here. We particularly would like to thank all those involved in the organization of the original meetings, especially Louise Pearson, Roger Doonan, Kevin Andrews, Helen Smith, Jeff Chartrand, Miles Russell, Mark Maltby, Mark Brisbane, Margaret Cox, Paul Cheetham, Damian Evans, and others in Bournemouth, and Timothy Champion, David Burley, John Carman, Joe Tainter, John Schelberg, Ronald Kneebone, Laurajane Smith, and Ian Richie for the Seattle meeting.

Bringing the volume together for publication has taken rather longer than initially anticipated, and for this we would like to thank all the contributors for their patience and express our gratitude to the University Press of Florida for encouragement and forbearance, particularly to Michele Fiyak-Burkley and Susan Duhon. In addition to those acknowledged by individual authors in the contributions below, we would like to thank Louise Pearson, Ehren Milner, Eileen Wilkes, and Vanessa Constant for their help in making it all happen, and especially Vanessa for her efforts knocking all the manuscripts into shape, chasing all the authors for those last-minute queries, and coordinating all our queries and requests.

Abbreviations

AAHRG	Avebury Archaeological and Historical Research Group
AAI	Aanvullende Archeologische Inventarisatie
AAO	Aanvullend Archeologisch Onderzoek
AARF	Australian Accounting Research Foundation
AHM	Archaeological Heritage Management
ARCHIS	Archaeological Information System
ARM	Archaeological Resource Management
ARMS	Archaeological Resource Management Section
ARPA	Archaeological Resources Protection Act
CAA	Centraal Archeologische Archief
CCC	Civilian Conservation Corps
CHM	Cultural Heritage Management
CRM	Cultural Resource Management
CVM	Contingent Valuation Method
DoE	Department of the Environment
FAIRA	Foundation for Aboriginal and Islander Research Action
GCI	Getty Conservation Institute
GIS	Geographic Information Systems
GNP	Gross National Product
HLF	Heritage Lottery Fund
HMC	Historic Monuments Commission
HPM	Hedonic Pricing Method
ICOMOS	International Council on Monuments and Sites
IKAW	Indicatieve Kaart van Archeologische Waarden
IO	Isolated Object
KMC	KwaZulu Monuments Council
MPP	Monuments Protection Programme
NADB	National Archeological Database
NAGPRA	Native American Graves Protection and Repatriation Act
NHL	National Historic Landmark
NHPA	National Historic Preservation Act
NMC	National Monuments Council
NPS	National Park Service
NR	National Register
NRHP	National Register of Historic Places

OAS	Organization of American States
OSM	Office of Surface Mining
PPG	Planning Policy Guidance
PRC	The Powder River Coal Company
RCHME	Royal Commission on Historical Monuments
SAA	Society for American Archaeology
SAAA	Southern African Association of Archaeologists
SAHRA	South African Heritage Resources Agency
SAI	Standaard Archeologische Inventarisatie
SANS	South African National Society
SHPO	State Historic Preservation Office
SMC	Scheduled Monument Consent
SRI	Statistical Research, Inc.
TAG	Theoretical Archaeology Group
TCM	Travel Cost Method
TCP	Traditional Cultural Property
THPO	Tribal Historic Preservation Office
TVA	Tennessee Valley Authority
UNESCO	United Nations Educational Scientific and Cultural Organization
USDA	United States Department of Agriculture
WHL	World Heritage List
WHS	World Heritage Site
WPA	Works Progress Administration

1

Introduction

Archaeological value in a world context

Clay Mathers, Timothy Darvill, and Barbara J. Little

We intend this book to be a call to action. Our essential purpose is to enjoin archaeologists and those concerned about the historic environment to think differently about how we conceive of, define, and assign value to archaeological places and how we, in the broader sense, understand "heritage." Furthermore, we hope that the papers offered here will help to revitalize discussion in areas of archaeological praxis that often have seemed both divorced from the mainstream of archaeology and largely dormant over the last few decades.

From the beginnings of the discipline, archaeologists around the world have made decisions about what should be protected for future generations, salvaged in the face of impending destruction, or allowed to be destroyed without record. Those decisions are related to the twin dimensions of value and importance, arguably the most fundamental concepts in cultural resource management. Despite their significance for archaeology as a whole, discussions concerning the definition, treatment, and interpretation of archaeological heritage have, since the 1960s, moved in and out of focus and swung markedly between active debate and widespread neglect: between being one of the discipline's Big Issues, and a ghettoized interest, restricted to dirt archaeologists and administrators.

Historical perspectives

Concepts of value and importance have been influenced by numerous factors emanating from both inside and outside the profession. In recent years, the range of archaeological places deemed to be valuable and important has broadened to include many extremely diverse resource types extending well beyond the traditional suite of functional categories such as camps, settlements, buildings, burial places, ceremonial centers, exploitation sites, and traces of cultivation. Archaeological heritage can now be seen to include, among many other things, sacred natural places (for example, rock outcrops, boulders, springs, and trees), historic

woodlands, battlefields, trails, and hedgerows. The multiplication of categories used to define archaeological heritage, together with the expanded range of resource types, has further amplified the intellectual and practical challenges involved in managing our cultural patrimony, whether we face that task at a local or international scale (see Briuer and Mathers 1996b: figure 1).

In one sense, archaeological resources are whatever archaeologists define them to be: the raw materials through which interpretations, explanations, and understandings of the ancient, and not so ancient, past can be anchored to the world around us. Increasingly, however, the position of archaeologists as the sole arbiters of our archaeological heritage is being scrutinized and questioned (see, for example, Smith, this volume). Who makes the critical determinations about archaeological heritage, and how these decisions are arrived at, has been the subject of considerable change and discussion over the last few decades as decisions about our cultural patrimony have become more public and political (for example, Layton 1994a, 1994b; Schmidt and Patterson 1995; Swidler et al. 1997). As new voices emerge from groups that have previously been underrepresented or ignored, there has been a considerable reshaping of archaeological discourse and practice with regard to what is significant, what protocols are appropriate in arriving at such decisions, and how different resource types will be treated. Papers included in this volume address challenges emerging in Australia (Lilley and Williams; Smith), South Africa (Whitelaw), Brazil (Funari), and the United States (Swidler and Yeatts; Baugher) with regard to these ongoing issues.

The political activism and empowerment of Native American and African American communities in the United States with respect to their heritage, in prominent cases such as the repatriation of grave goods and skeletons in museum collections and the recovery of remains from the African Burial Ground in New York City, continue to have ripple-like implications for archaeological practice, the heritage endeavor generally, and the public at large. For many of those unaccustomed to debates about cultural heritage, events such as the reunification of Berlin and the attacks of September 11, 2001, on New York and Washington, D.C., have raised the visibility of these issues to something more than incidental and esoteric. What we do with the Berlin wall and at Ground Zero, for example, has now become part of an active debate about what our heritage is and should be, what form our collective memory (and memorials) should take, and how we, as a culturally variegated society, arrive at our decisions. As archaeologists, we should welcome these opportunities to reflect critically on how we work and how we are connected to the cultures in which we live and participate.

Within the archaeological profession, theoretical and methodological approaches to heritage have also expanded considerably since the early days of cultural resource management. As noted above, increased levels of public concern and more vocal public debate about the future treatment of cultural heritage

Table 1.1. List of major U.S. federal laws concerned with natural and cultural heritage passed in the period 1964–1979

Federal Legislation	Year passed by U.S. Congress
Wilderness Act	1964
National Historic Preservation Act	1966
National Wildlife Refuge System Administration Act	1969
Clean Water Act	1972
Endangered Species Act	1973
Archaeological and Historic Preservation Act	1974
Federal Land Policy and Management Act	1976
Archaeological Resources Protection Act	1979

have influenced archaeology in a profound way as descendent and local communities play larger roles in postcolonial resource management. Archaeology as a discipline is also more broadly defined, with a greater plurality of theoretical orientation than ever before. Central to many of these approaches is the isolation of *the significant* as the focus around which debate revolves. Whether this takes the form of classificatory systems in cultural–historical approaches, the definition of social subsystems in processualist thinking, or the isolation of symbolic meaning in post-processual studies, the business of sifting, sorting, structuring, and ordering archaeological entities pervades the discipline.

In the field of resource management, these tasks, and the obvious difficulties associated with them, are all the more visible and contestable. While research-oriented and university-based archaeology is often focused on single sites and small areas and emphasizes long-term work on nonthreatened heritage, cultural resource management (CRM) archaeologists contend with larger areas, more public scrutiny, and a more vigorous *contest of values*. Between the mid-1960s and the mid-1970s, a variety of landmark heritage legislation was passed in the United States, prompting widespread changes in the practice of both natural and cultural resource management throughout the county.

Table 1.1 provides a list, by no means comprehensive, of pioneering federal laws passed during the 1960s and 1970s. It is perhaps no coincidence, therefore, that in the wake of this active period of debate, political action, and legislative activity, there was a notable surge in the number of publications dealing with archaeological resource significance (especially during the late 1970s), with a fairly steady, if sometimes small, number of publications appearing over the following two decades (see Briuer and Mathers 1996a). From the late 1990s, renewed interest and concern can be detected, especially among those archaeologists working in the publicly funded sectors. One focus of this latest phase of interest is a call for greater formal guidance concerning how cultural heritage

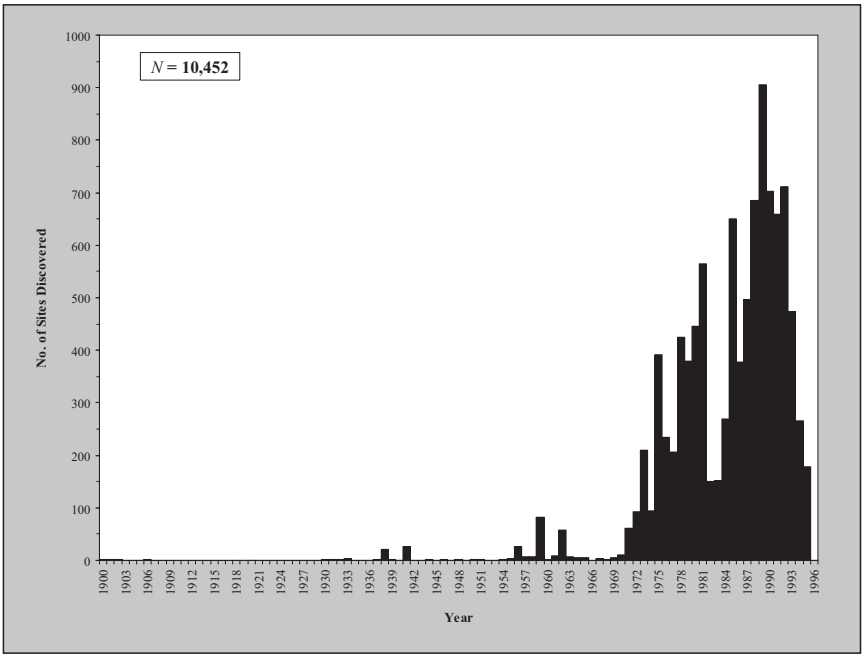

Fig. 1.1. Sites discovered by year, Rio Arriba County, New Mexico, 1900–1995.

legislation is to be interpreted and implemented and, more recently, new directions in educational curricula (for example, Bender and Smith 2000).

Other major developments that continue to affect archaeological heritage management in a significant way are the improvements in archaeological survey and data recovery methods. In the United States, with the introduction of better methods of site discovery in the late 1960s and early 1970s (in parallel with major federal legislation protecting archaeological heritage), the number of sites being reported increased dramatically. A large data set from Rio Arriba County, New Mexico (reported on in more detail by Mathers, Schelberg, and Kneebone, this volume), highlights the magnitude of this change. The number of recorded archaeological sites reported in Rio Arriba County rose sharply after 1969 (figure 1.1), a date that is significant given the passage of the National Historic Preservation Act (NHPA) a short time earlier. As a result of this influential act and other important legislation that followed in the early 1970s, archaeological jobs, sites, and associated cultural material began appearing on an unprecedented scale. The result of this activity has been a vastly improved knowledge of our cultural heritage, but the volume of information has begun to create problems, too, particularly in recent years. Accumulated remains and records from more than three decades of CRM activity have now become a major curation issue for those public and private entities responsible for storing this large body of information (Marquardt et al. 1982; Kodack and Trimble 1993; Childs 1995;

Parezo 1999; Thompson 2000; Robbins 2001; Stewart 2002; Traver 2001). The problem is by no means confined to the United States (Thomas 1991).

In this context, heritage management and preservation must inevitably expand beyond their traditional boundaries, that is, the curation and conservation of artifacts and the physical protection of sites in the field. Without due attention being paid to other forms of documentation relating to these sites and objects (for example, maps, photographs, field notes, reports, drawings, and, increasingly, digital records), the critical contextual information needed to interpret sites and landscapes will be lost (Richards and Robinson 2000). Our conservation and preservation responsibilities extend not only to what we are collecting and creating in the present but also to the accumulated information produced by earlier generations of archaeologists. The dilemma that emerges is, therefore, one that confronts us not only in the field at the side of open trenches, but also among the sagging shelves of museums and curation facilities and within the undigested tsunamis of digital data. Many pragmatic and logistical questions such as *what* to preserve, as well as *how*, *why*, *for how long*, and *for whom,* still remain to be addressed by a profession that is only now coming to grips with the material manifestation of its success.

Returning to the more general issue of value and significance, it is clear from a historical perspective that an interest in the way that archaeological resources are valued is not new. Baldwin Brown's pioneering work on the care of ancient monuments published at the beginning of the twentieth century starts from the proposition that "the abstract value to the community of the objects or scenes under consideration will as a matter of theory be generally admitted" (Brown 1905: 24). Perhaps naive to modern eyes, the acceptance of an assumed rather than a demonstrated value has perhaps stood the discipline in good stead for several decades. The need for more explicit statements to justify archaeological activity and explain the basis of selective preservation has grown with the expansion of resource management, the competition for resources, the recognition that not everything can be treated equally because of limited resources, and the integration of archaeological management work into wider environmental interests. By the time Michael Schiffer and George Gumerman published *Conservation Archaeology* in 1977, archaeological thought was beginning to crystallize, although old tensions remained. Introducing the section on assessing significance they note that

> the concept of significance, like no other in conservation archaeology, is a constant source of frustration and inspiration. We are frustrated because we wish that significance would be ignored. . . . Nevertheless, the many kinds of significance that need to be taken into account when assessing resources often immerses the investigator deeply in the most fundamental, intriguing problems of the discipline: the nature of archaeological data and the relationships between archaeology and society. (Schiffer and Gumerman 1977: 239)

A year later, Michael Moratto and Roger Kelly asserted that "the assessment of significance is central to archaeological research and management planning" (1978: 1), before going on to introduce a wide-ranging discussion that did much to clarify thinking on the definition of significance as a means of underpinning explicit values that may be attached to particular sites or areas. They emphasized that there are many standards of significance applicable to cultural resources, and that these vary according to the qualities of the resource, the context of assessment, and the perspectives of the evaluator (1978: 23). Several subsequent treatments focused on matters such as scientific, historical, ethnic, public, legal, and monetary significance, paving the way for a number of studies that elaborated these themes as expanded schemes and value systems (for example, Lipe 1984; Darvill 1993). Running through all of these studies is the crucial point, well recognized by Schiffer and Gumerman that "relativity" is perhaps the single most outstanding quality inherent in the concept of significance, for significance can only be interpreted by employing some explicit frame of reference (Schiffer and Gumerman 1977: 239).

Frames of reference

Building on this point, it was the idea of frames of flexible reference that are both contestable and negotiable by parties having different standpoints and perspectives that provided the starting point for the thinking behind the papers assembled in this volume. Three broad domains of interest, which are traditionally regarded as affecting the way that frames of reference are established and aspects of archaeological resources are discussed, can be identified.

First is the physical and intellectual environment within which the value and importance of archaeological remains are established. Archaeological resources do not exist in isolation, nor are decision makers remote from cognate, sometimes overriding, interests. What is valued at any one time and in any one context depends upon a whole range of considerations, which in broad terms situate archaeological remains in relation to other goals and objectives. Recognition and acceptance of the physical impact of archaeological material may be important here; attention to the visible and upstanding heritage may be strong even while subsurface and currently invisible material is dismissed or ignored.

Second, there are moral and ethical considerations that underpin and inform particular approaches and perspectives. The financial or monetary value that attaches especially, but not exclusively, to portable antiquities provides a dimension of value that challenges academic assumptions regarding and reasoned arguments asserting the importance of things. Kristiansen notes (1979: 7–11), for example, that in early nineteenth-century Denmark, the temporal sequence of finds reported from regions around the country was directly linked to the differing monetary values attached to gold, bronze, and iron artifacts. Such matters are widely recognized in the ethical principles accepted and promoted by archaeolo-

gists and heritage managers (Vitelli 1984; Chase et al. 1996; Renfrew 1999; Wylie 2000). Rather different, but nevertheless concerned with financial value and the realization of rewards from the formal designation and enhanced importance of places and buildings, is the dynamic effect that the conservation of buildings and areas has on capital value, price, and rental income (Allison et al. 1996). In a recent review of the heritage dividend in Britain, English Heritage (1999) found that every £10,000 invested in partnership schemes within designated conservation areas leveraged £48,000 in matching funds from the private sector and public sources, which typically resulted in 177 square meters of improved commercial floor space, plus one new job, one job safeguarded, and one improved home. Another study conducted in Fredricksburg, Virginia, found that following historic preservation efforts, residential property values rose 674 percent (from 1971 to 1990), while the value of nearby homes, outside the historic district proper, rose by 410 percent during the same period (Veasey 1997). Identifying areas as something special, designating them in some way, and using that designation for the discriminatory allocation of support is big business and a sharp tool for governments to use in promoting regeneration, internal investment, and a strengthened sense of community.

In addition to the ethical issues outlined above, two other key areas are worthy of attention. One is the matter of commercialization (SAA 2000: 11; Principle 3) and the need for fair, realistic, and supportable assessments of archaeological significance and the importance of sites/finds. Brian Fagan, Paul Bahn, and Bettina Arnold among many others (see Stoddart and Malone 2001) have noted how pressure from the media in particular has variously encouraged the exaggeration of results and the implications of new discoveries for all sorts of reasons, among them the need to attract funding for ongoing research. A second but related ethical issue is the recognition that different values may be attached to things and places by specific ethnic, religious, or cultural groups (see SAA 2000: 11; Principle 4).

The third main domain lending structure to the way that issues of importance and value are addressed is essentially an operational one. At one level, this operational approach may be related to legislation and the associated legal frameworks (Hardesty and Little 2000: 7–9). Scales of importance are in some cases enshrined in the legislation itself. Thus, in England, Wales, and Scotland, for example, the Ancient Monuments and Archaeological Areas Act of 1979 incorporates a binary scheme whereby protection through scheduling is offered to monuments of "national importance," by implication associating all other monuments with a less-valued status. Determining nationwide importance is itself increasingly difficult, and since the early 1980s, it has been the subject of systematic survey using a scoring system (see Darvill, this volume). By contrast, in Denmark, the Protection of Nature Act No. 9 of January 3, 1992, incorporates within its rubric narrow definitions of the way the provisions will be applied so that there is blanket coverage for all visible examples of certain defined classes of monument

(ten classes are listed, including burial mounds, fortifications, and rock carvings); items on two other lists (Part 2 with nine classes, for example, mills, holy wells, and stone banks; and Part 3 with eight classes, for example, trapping pits, memorial monuments, and soldier's graves) are covered by the legislation only when their existence has been communicated to the owner of the land on which they lie. In resource management terms, the different lists, which in a way translate into grades of importance, carry different practical implications: The first two lists include protection not only for the monument itself but also for the entire area within 100 meters of the monument; monuments on the third list do not enjoy this wider level of protection.

Operational matters also introduce issues of scale and the impact of value gradients. The rationale behind the development of many grading systems is to identify those resources that are most significant or most important in relation to a specified purpose. Inevitably, this creates divisions and categories and causes things and places to be excluded as well as included. What happens to the things or places that are not regarded as important? There is some potential here to exploit value gradients rather than simple categories, but even if national, regional, and local levels of importance are defined, questions arise, such as how nationally important places are viewed in the local context and why it is that everything of national importance is generally accepted as also having local importance but not vice versa.

The complexities of these three domains and the need to unravel how they impact on heritage management seem frequently to outpace the conceptual tools available to deal with them. While to varying degrees, idiosyncratic, ad hoc decision making and implicit assessment strategies continue to be commonplace in the day-to-day practice of heritage management, theoretical models and operational examples of best practice continue to be rare. Critical debate concerning the value and importance of archaeological places needs to begin to break out of the traditional domains that structure our approaches. This is essential to the growth and development of responsible, comprehensive research and management strategies within heritage policies, and within the practice of archaeology generally. The artificial separation of heritage management and research within archaeology continues to be a major obstacle to innovation and constructive self-criticism.

Addressing and changing practice

In practical terms, addressing and changing practice means thinking differently, and we anticipate that the result of thinking differently will prompt fresh approaches to the treatment and understanding of the archaeological heritage. All the contributors to this volume recognize that archaeology is in a process of perpetual and fundamental change. The vast majority of archaeology in the world is done in the context of managing resources or heritage. Whether a prac-

tice is referred to as cultural resource management (CRM), cultural heritage management (CHM), or archaeological resource management (ARM) is *not* only a matter of national preference. The very choice of words, which colors perceptions about the places that are preserved or destroyed, is changing. Choosing to use words such as "prehistory" also has its consequences, as Lilley and Williams point out later in this volume. Even the term "archaeological heritage" has become the center of considerable debate (Skeates 2000). Changing the way we conceptualize the past is related to the language we use, and to the people we include or exclude by employing that language.

The language at the very core of archaeological method is also in question. We expect to find "sites," but that word may not accurately reflect how people live(d) and use(d) the land, as several authors in this volume suggest (Altschul; Boyd et al.; Lilley and Williams; Tainter and Bagley). Old notions of fabulous places worthy of exploration were not discarded with the science of the New Archaeology, and, in spite of efforts to recognize the importance of settlement patterns, the focus remains on sites rather than on landscapes. This emphasis of archaeological research on single sites, frequently at the expense of the larger cultural and geographic frame in which they are embedded, has had lasting consequences for our understanding of archaeological heritage, as well as for its physical integrity. Since we now possess a wealth of analytical tools and approaches that give us the capability of exploring significance in a myriad of ways at the landscape and regional scale, it seems that we can, and should, do better.

One of the straightjackets that archaeologists need to escape from is our own overly categorized learning. We need to recognize the constraints that we have accepted along with the dominant evolutionary paradigm (see Tainter and Bagley, this volume), which make us see large, salient sites as the point both of evolution and of the discipline. As Denis Byrne observed over a decade ago, "What is missing in the consciousness of heritage management practitioners generally: an understanding of the values underlying the Western management ethos and an openness to alternatives" (Byrne 1991: 273). Such values are deeply embedded in social and intellectual contexts. Consequently, a more rigorous analysis of where we have been and a more robust critique of where we are currently would do much to improve the quality of theory and method applied in archaeological heritage management. Mathers, Schelberg, and Kneebone, in their paper on heritage management in New Mexico (this volume), for instance, offer an example of how historical data can be used productively to critique the past and current practice of archaeological heritage management.

As the heritage project grows to include more disciplines and communities, there is a trend to integrate archaeology with other values in an interdisciplinary and multiconstituent approach. Mary Hufford (1994a) describes some of the serious attempts at such integration in the United States. Hufford calls for rethinking the federal government's cultural mission and national system of heritage preservation and talks of shifting from a top-down paradigm to "an ap-

proach more open and responsive to grass-roots cultural concerns" (1994b: 1). The U.S. legal structure, as several authors mentioned above have noted, encourages separation into categories of nature, the built environment, and folklife or living culture. Heritage, however, tends to ignore such boundaries because people use a wide range of resources in creating and sustaining their culture. As heritage professionals attempt to deal more realistically with resources, what "is at issue is the process for determining the significance of contested resources. Assigning significance to any resource is a matter of describing the context within which the resource makes sense" (Hufford 1994b: 5).

Heritage of value: An outline

Each of the seventeen papers in this volume concerns some aspect of social or political power: the power to identify, designate, judge, research, save, and destroy. Exercising such power is often emotive and controversial, and the outcome is sometimes contested. At the local level, decisions about the value of remains or resources may directly affect a developer's cash flow or the ongoing employment of an archaeological team. At a quite different level, decisions by a professional organization or government department about how and where to spend taxpayers' money on conservation may well be viewed differently by different local communities. As Mathers, Schelberg, and Kneebone emphasize in their paper (chapter 10, this volume), archaeologists need to face, in a more direct and explicit way, the long-term reality of their decisions and the effects of those decisions on the future as well as on the present. New approaches, both theoretical and methodological, are offered in the wide range of contributions offered in this book. Although the cultural context, geographic scale, and particular issues addressed in each paper vary significantly, all share the goals of reinvigorating debate about the meaning of archaeological heritage *and* transforming the current practice of heritage management.

We have divided the contributions into four sections. By the sequence in which they are presented, they lead us from the wide and generalizing perspectives of theoretical approaches and the way significance has come to be viewed in European and American resource management, through the particular approaches adopted in various parts of the world, to schemes for judging value and importance in a range of situations and social contexts. The volume ends with three papers that examine the implications of these general matters on the management of particular sites. Although some of the papers adopt a peculiarly "Western gaze" regarding what is important and valued among the places and things of the cultural heritage, a number of other perspectives that take alternative positions, as with Sherene Baugher's review of sacredness in relation to Native American sites (chapter 14) and Gavin Whitelaw's examination of changing views in South Africa (chapter 9), are introduced from around the world. Throughout, our aim

is to be polemical in the hope that future work on the theme of value will be reflective.

The first section then, Archaeology and Heritage, is the call to action: a call to start thinking about issues of value and significance from a starting position outside the purely pragmatic and immediate needs of getting a job done or satisfying the latest trendy political agenda. We want this book to initiate serious discussion among archaeologists, and among all those who are interested in the archaeological heritage, about what it is and what it all means, as well as how we value and care for it. Starting from an overtly theoretical position several steps back from the business of making decisions, Timothy Darvill (chapter 2) asks fundamental questions about how current concepts of significance emerged against the background of modernity and how social values and professional interests fit together within broad social frameworks. John Carman (chapter 3) takes this further by contrasting the positions of those who see archaeological resource management as being solely concerned with the "stuff" of the past and those who emphasize the process or practice of management as a socially relevant project in the contemporary world. There is a danger here, he warns, that we may become overly concerned with performance and forget to ask about the purpose of what we do. This theme is picked up by Joe Tainter and Bonnie Bagley (chapter 4), who complete this section by calling into question the unconscious assumptions that underlie the practice of archaeology and affect the ways we recognize and value sites.

Accepting, recognizing, and indeed developing the social context of archaeological materials and the archaeological project underpin the papers included in the second section: Archaeology in Context. In this section, the focus shifts toward the identification of power relations and dominance structures in the definition and negotiation of value and significance. As a starting point, Laurajane Smith (chapter 5) explores archaeology as a technology of government, emphasizing the fact that while some groups see material culture as a physical resource linked to history and the past, others use it in an active process to create, recreate, or maintain cultural and social identities. She shows how archaeological significance criteria used in cultural heritage management become not only a means through which Aboriginal cultural identity is governed, but also a means by which archaeology as a positivist science is itself regulated and maintained. William Boyd, Maria Cotter, Jane Gardener, and Gai Taylor (chapter 6) note how the traditional view of a single history is increasingly untenable and open to contest. Using case studies such as the Suffolk Park buried shipwreck, the Woody Head campground, the Alstonville historic town and countryside, the Beachmere Aboriginal midden, and the Gumbooya Aboriginal rock art site, the conflicts between fundamentally different perceptions of interest and significance are highlighted. They argue powerfully for accepting the inherent validity of diverse meanings, and propose that resource management adopt a more fluid and multi-

vocal approach to determining significance. The public nature of archaeology and the public nature of the materials that archaeologists are charged with looking after leads Barbara Little (chapter 7) to explore the relationships between public memory and the U.S. National Register of Historic Places. Although many archaeological sites are eligible for listing in the National Register, a high proportion are treated either by avoidance or mitigation through data recovery. This incompletely considers the public benefit of archaeological sites to the nation's sense of identity. Contrasting the forces affecting heritage, the state, community, and archaeological profession, Pedro Funari (chapter 8) highlights the effects of an unstable government on the heritage project in Brazil. Advocating a humanistic perspective on heritage management, he notes a growing awareness of the political and ethical responsibility of empowerment, thus giving more diverse groups of people access to archaeological remains. It is an approach whose acceptance finds support in many places. Gavin Whitelaw (chapter 9) examines how significance has been defined in South Africa and how the definition has changed since the end of apartheid. Here, legislation passed in April 2000 promotes research into "living heritage" and recognizes the existence of the multiple and different value systems that many of the papers in this section advocate.

Making legislation and solid well-supported perspectives work in practice for the benefit of not just one sector of society but all sectors is one of the great challenges for cultural resource management in the twenty-first century. In the third section, Judging Value and Importance, the practice of determining, measuring, describing, and communicating value and importance comes under scrutiny. The authors present cases that contribute to developing good practice in the process of heritage management. Ian Lilley and Michael Williams (chapter 13) focus on the situation in Australia, neatly complementing the earlier papers by Laurajane Smith (chapter 5) and W. E. Boyd and colleagues. (chapter 6). Ian Lilley and Michael Williams demonstrate the advantages of collaboration between archaeologists and the Aboriginal and Torres Straits Island people of Australia, arguing that the separation of archaeological and Indigenous interests has outlived its usefulness and that a new era of integrated collaborative research and management is needed. Native American sacred sites are the subject of Sherene Baugher's paper (chapter 14), in which she discusses burial sites and other places important to Native Americans while again asking the question, "Whose culture are we preserving?" The nature of direct involvements with these sites, she argues, should extend beyond legal obligations and deal also with ethical goals. This theme is again taken up by Nina Swidler and Michael Yeatts (chapter 15) in their discussion of traditional cultural places in the United States. They argue for tribal participation in the preservation program and offer guidance concerning the treatment of these valued places so that they can continue to play a role in the history and cultural maintenance of a tribe or descendant community. In the Southwestern United States, Jeff Altschul (chapter 11) presents a case from the state of Arizona to argue for a different way of thinking about sites and the land-

scape, one that takes us away from the hegemony of scientific thinking and the application of hypothetico-deductive research paradigms. What is needed, he suggests, is to find ways of recognizing the changing scientific nature of the significance of the archaeological record in a compliance process that should be routine. Making good use of archaeological knowledge in more holistic ways than hitherto used is the subject of the paper by Clay Mathers, John Schelberg, and Ronald Kneebone (chapter 10). They use a quantitative spatial analysis to explore a variety of thematic and geographical contexts relating to archaeological significance and to promote more responsible, comprehensive, and informed decision making. In a rather different way, Jane Grenville and Ian Ritchie (chapter 12) present two cases, a Roman amphitheater and medieval townhouses in England, and stone circles and coal mining in the U.S. state of Wyoming, to argue that the research value of archaeology should be the overriding consideration in the decision-making process.

Making things work on the ground is, of course, the ultimate test of any proposals that address the way we value things and assess their significance. Many of the papers in Sections II and III include the experiences of their authors in trying out novel approaches. The three papers in the fourth and final section, Managing Valued Places, focus on approaches that have been already been developed and implemented, so now a reflective look at their achievements and further potential is possible. Deeben and Groenewoudt (chapter 16) describe the national approach to archaeological significance in the Netherlands, emphasizing the importance of predictive modeling in investigating much of this nation's buried heritage. Melanie Pomeroy (chapter 17) discusses management approaches to the World Heritage Site of Avebury, which includes a prehistoric henge monument and its associated landscape, in southern England. Kate Clark's contribution (chapter 18) concludes the volume by providing a broad overview of the management of heritage places with a view to sustainability and the integration of archaeological work with wider social and economic concerns. In so doing, she returns us to the question that opened the discussion: "What is it that we are valuing?"

Conclusion

The attempt to revitalize simultaneously many of the major issues that inevitably surround archaeological value and significance is paramount to what former governor of New Mexico Bruce King once referred to as "opening a box of Pandoras." Having done so, we are acutely aware of the intellectual debt we owe to our many colleagues whose data and ideas we hope to have built upon in presenting this collection of papers. We have gone over some of the same ground to be sure, since there were still many productive *seeds* there, many of them planted in the literature more than thirty years ago. In our view, however, many of these ideas have yet to produce their true yield or bring about fundamental

changes in archaeological praxis. For our part, we hope to have sown a number of new ideas that will animate our colleagues to critique, improve, and build on what is offered here.

Encompassed in the thematic subject areas listed below are some of what we believe to be new perspectives, capable of beginning new major discussions within archaeology concerning the theory and practice of heritage management. Adequate discussion of these would more than likely require another book, but a summary of them will hopefully encourage readers to examine closely all of the contributions presented in this volume.

Theory and practice

The artificial divides between theory, research, and management in archaeological heritage, which featured prominently in literature of the mid-1970s to mid-1980s (for example, Lipe 1974; Glassow 1977; Raab and Klinger 1977; Schiffer and House 1977; Dunnell 1984) have begun to erode, as witnessed by many of the contributions in this volume. Papers in all four sections of this book, for example, offer contributions combining all three elements: theory, research, and management. Significantly, too, the issues they address are not restrictive, either geographically or intellectually. Instead, they focus on questions that are of common concern to archaeologists everywhere, whether based in universities, in management positions, in museums, in the private sector, or elsewhere. The dearth of empirical case studies, noted in a review of archaeological significance some years ago (Briuer and Mathers 1996a: 24), has been addressed in this volume by papers offering a balance of method, theory, and data.

Politics and representativeness

The political context of archaeological heritage, and of archaeologists, in the contemporary world is also addressed in depth by many of the contributions to this book. The variety of contributions from the United Kingdom, Australia, Brazil, South Africa, and the United States emphasize the range of political and cultural agencies that shaped the archaeological record in the last century and continue to do so today. Many of these processes (and their impacts) have remained quietly in the shadows despite their importance to the development of theory, practice, and cultural preservation generally. In addition, many of the papers highlight practical approaches to more holistic and inclusive heritage management strategies, particularly in the context of more culturally diverse societies.

Heritage and accountability

While biological, geomorphic, and environmental pressures of various kinds have often been identified as agents responsible for transforming the archaeological record, the impact of archaeologists themselves has been far less explicitly studied, whether in heritage circles or within the archaeological profession as a

whole. In Sections I and III particularly, a number of papers emphasize the need to acknowledge and examine the consequences of archaeological practice on our collective cultural heritage. The ideas presented in these contributions, as well as their data-oriented analyses, have important implications for our approaches to heritage management and to archaeological research and analysis generally.

Data quality

The quality of the information used in defining the significance, importance, and value of archaeological heritage is also a major concern identified in many pages of this volume. Many of the assumptions employed in assessing cultural resources, as well as much of the data on which these assumptions are based, have escaped the close scrutiny they deserve. Returning to issues such as the definition of *site,* the representative nature of state and national records, and the geographic frame for assessing significance, all have more than esoteric value. The quality of the information we employ in managing archaeological heritage concerns fundamental issues relating to how archaeology as a discipline is conducted: what we think we know, how well we think we know it, and why. By returning to core assumptions about the quality of archaeological data and the practice of cultural resource management, several papers in the book challenge, constructively, existing notions of how we manage cultural heritage. In a broader sense, too, they dispute the widely held ideas that the heritage management literature fails to address bedrock issues critical to the health of archaeology as a whole.

Critical and reflective historiography

The challenge of improving the current practice of heritage management in archaeology depends in large measure on an understanding of where we have been historically as a discipline. Several papers in the volume stress the importance of examining the history of CRM/CHM/ARM with respect to both explicit statements of theory and method (in the literature) and the genuine implementation of these ideas (and other less explicit ones) in practice. More effective monitoring of what we have done and a better understanding of its consequences will, it is argued, help us to approach cultural heritage with a more self-critical and historically aware perspective. Historical perspectives of this kind are an essential step toward reforming and expanding *good practice.*

The burgeoning of new issues and analytical tools along with the increasing public awareness and interest in heritage will, we believe, initiate a new period of active discussion among archaeologists and others regarding the heritage endeavor. We are therefore hopeful that the papers contained here will stimulate renewed discussion of archaeological significance and value. While we hope that there are arguments here that will find general agreement among archaeologists and heritage professionals, the revival of these important issues is more important than consensus. In this context, former mayor of New York Ed Koch put it well when he said, "If you agree with me on six out of ten issues, vote for me. If

you agree with me on ten out ten issues, see a psychiatrist." Given the complexity of the subjects raised in this volume and the inherently dynamic nature of archaeological significance, we realize many of our own limitations and welcome a new period of discussion within archaeology and beyond.

As a group, the seventeen papers that follow identify key dimensions of archaeological heritage in many parts of the world and in relation to many situations and traditions. The details of the material they introduce and the case studies they present are diverse, but the message is identical. Significance, value, and importance are not just relative concepts, they are also highly contextual. Renewed attention to our widely varied contexts of practice and their consequences will, we believe, ensure the best future for our collective cultural heritage.

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I

Archaeology and heritage

2

"Sorted for ease and whiz"?

Approaching value and importance in archaeological resource management

Timothy Darvill

Introduction

Archaeological resource management is not what it used to be. Increasing competition for scarce financial and human resources in a world driven by what might be called the "Bigger," "Better," "Faster," "More" imperative, coupled with the inevitable need for selectivity in our commitment to particular archaeological remains, means that archaeologists are not only having to justify their very existence and the work that they do but also to make complicated, rational, and justifiable judgments about the future of diverse archaeological materials. As a result, issues of "value," "significance," and "importance," what might collectively be called the process of "valuation," have become central elements in archaeological resource management in most parts of the Westernized world, and elsewhere, too. In practical terms, valuation has become critical in the interpretation of results from what in Britain has become known as field evaluation (Champion et al. 1995; Darvill et al. 1995: 27–39), and in the integration of archaeological considerations during environmental impact assessment (Ralston and Thomas 1993). But there are also wider issues.

Since the late 1970s, a fairly substantial literature has developed on the valuation of archaeological remains, focusing both on general principles (Glassow 1977; Moratto and Kelly 1978; Lipe 1984; Darvill 1993; Carver 1996) and on specific aspects of the archaeological resource, including, for example, rural sites (Groube 1978), the selection of monuments for protection through law (Darvill et al. 1987; Startin 1995), and urban deposits (Ove Arup and Partners et al. 1991; Carver 1993: 1–18). In general, however, there has been little critical attention paid to the underlying philosophies that are either implicit or explicit in the approaches and schemes suggested. Even a cursory scan of the literature reveals

that notions of "value," "significance," and "importance" are rather vague and ill-defined, and that these terms are used interchangeably. Key questions such as, valuable to whom? significant in what context? or important for what? rarely seem to be asked, and yet they lie at the heart of the debate.

Elsewhere, I have drawn attention to the development of value systems and the social context of their emergence (Darvill 1995), while John Carman (1995, 1996) has considered the relationships between law, particularly English law, archaeological materials, and the emergence of ascribed values pertaining to different elements of the archaeological resource. Carman concluded that the law could be seen as part of a reductive and homogenizing process so far as the components of the heritage are concerned (1996: 173), and in many ways the same can be said of academic discussion of valuation in archaeology, which also tries to develop a single, perhaps universal, approach to the recognition and articulation of archaeological value. Martin Carver, for example, asserts that the purpose of his paper on archaeological value "is to propose a definition of archaeological value which can serve the debate on behalf of archaeologists" (1996: 45). Likewise, CAG Consultants (1997: 1), in reviewing the eco-economists' idea of environmental capital and proposing instead a new approach based on the assessment of "functions" rather than "features," aim at nothing less than helping "policy makers and practitioners achieve an integrated, long-term approach to environmental protection and enhancement in policy and planning processes." Reading either of these papers, one could perhaps be forgiven for thinking that the objective was to provide an overarching model for the assessment and subsequent judgment of archaeological remains that was straightforward in its application and suitably trendy in its approach: to twist the title of Pulp's summer release of 1997, to get the valuation of archaeological resources "sorted for ease and whiz."

In this paper, I want to take one step back from operational aspects of determining the significance of particular archaeological remains or deposits and focus instead on the situational context of archaeology in general and the archaeological process in particular. My starting point is the recognition that the development of archaeological resource management is itself a consequence of modernity, the adoption of modes of social life and organization that emerged in Europe from the seventeenth century onward, and which has subsequently became more or less worldwide in its influence (Giddens 1990: 1). The relationship between social life and archaeological practice can be examined through the application of a hermeneutic model in which distinct but interrelated spheres of action and agency can be recognized. On the basis of this model, I will argue that "value" and "importance/significance" are not the same thing because they refer to two distinct, but connected, spheres of meaning. In the first, there are social values which, while not universal, are widely held. In the second, there are scales of importance or significance which are objective-specific and, in social terms,

differently situated. These two spheres are examined with reference to recent and current approaches to the valuation of archaeological materials in Europe.

Implications of modernity

There has not always been the need for the explicit articulation of ideas about value and importance. In his extended essay entitled *The consequences of modernity,* sociologist Anthony Giddens notes four main shifts in the social organization and institutional form which characterize modernity: surveillance; capitalism; military power; and industrialism (Giddens 1990: 59). It is the last of these that is perhaps most important for archaeology because "modern industry, shaped by the alliance of science and technology, transforms the world of nature in ways unimaginable to earlier generations" (1990: 60). Although we might, as archaeologists, be critical of some of Giddens' simplification of what we know to be complicated historical trends, his basic analysis holds up and has within it two important points in relation to the question of value and importance.

First is the way that sources of risk and danger facing society and the world it creates for itself have changed. In the premodern world, most threats and dangers were perceived as emanating from nature. In the modern world, most threats and dangers are perceived as resulting from the reflexivity of society: that is, an organizational form constantly referring back to itself to define a sense of being. In consequence, within premodern society, there was a series of answers provided by beliefs and received wisdom. In modern society, there are only ontologically oriented questions. The change can be seen clearly enough in some highlights of society's approaches to the archaeological resource itself, mirroring a series of more deep-seated intellectual shifts in what Andrew Sherratt (1996: 142) has usefully set out as a cultural dialectic. First, there was the Christianizing of pagan images in the early Middle Ages (for example, Grinsell 1986). Next, came the development of antiquarian concerns for protection and preservation articulated so clearly in the writing of William Stukeley and others and coincident with the emergence of modernity (compare Marsden 1984). Finally, there are the current concerns about the nature of the past and the definition of what constitutes the archaeological record and what we should call its recognizable elements (for example, Hodder et al. 1995).

The second of Giddens' insights of use here is the recognition that in modern societies, it is abstract systems that provide the means of stabilizing social and economic relations across indefinite spans of time and space. These systems are future-oriented and often counterfactual as a mode of connecting past and present. As such, they contrast with premodern situations in which local communities provided the setting, religious cosmologies provided a providential interpretation of human life and nature, and tradition provided a means of connecting present and future through reference to the past. Again, these changes are evident

in the development of archaeological resource management. In Britain, it is mainly conflated within the hundred years or so between the passing of the first *Ancient Monuments Protection Act* in 1882 and the integration of archaeological issues into the town and country planning system with promulgation of the Planning Policy Guidance on Archaeology and Planning Act in 1990 (DoE 1990; Champion 1996).

For archaeology, the emergence of modernity provided the social context for the institutionalization, objectification, and commodification of archaeological materials. What changed was the set of relationships that allow individuals either singly or in groups to derive meaning from the physical world in which they find themselves. At this point, archaeologists were not only reading the past but also reading the present. There are no absolutes or intrinsic attributes that can be separated off from what we experience in the world. Value and importance are just as much sets of meanings and understandings derived from a body of material as is the reconstruction of Neolithic burial practices or the development of a view about medieval kingship. The socially prescribed detachment that distances archaeologists from the material which is the source of the meanings they are trying to discover is exactly the same for those researching the past in the present as it is for those managing the past for the future. In exploring this relationship, the principles of hermeneutics (the art, skill, theory, and philosophy of interpretation and understanding) potentially provide a number of insights and allow the development of a model.

A hermeneutic model of value and importance systems

In essence, the problem faced by archaeologists in justifying their work, or making a valuation of some aspect of the archaeological resource, is one of detachment between the agent or person seeking an understanding (subject/ego) and the material under scrutiny (object/real world). The latter can variously be seen as a socially defined subset of the physical world, for example artifacts and structures, or indeed metaphorically as a text. The act of understanding involves bridging the gap between subject and object, represented in hermeneutics as an intellectual or cognitive action, which is two-way and essentially circular or cyclical in the way it operates (figure 2.1).

There are three aspects of the hermeneutic circle particularly relevant to its application in archaeological resource management. First are Martin Heidegger's insights, which focus on the way that understanding is constructed within the framework of human existence and experience (Heidegger 1962). In this way, there is a phenomenological relationship between subject and object, in which the subject holds a preunderstanding of the world and thus experiences the object according to those principles (figure 2.2). In this way, the gulf between subject and object is significantly reduced, if not rendered altogether invisible.

Fig. 2.1. Schematic representation of the hermeneutic relationship between subject and object.

Heiddegger's work was later developed by Hans-Georg Gadamer (1975) to provide what can be recognized as the second aspect, namely the way that prejudice, tradition, and authority relate to the act of understanding. These things make any set of understandings historically located within a tradition credited with authority (historic context) and which therefore relates to the viewpoint of whoever wishes to understand (figure 2.3). Taking this still further, Anthony Giddens (1984: 284 and 374) defines what he calls a double-hermeneutic, which is the third aspect. Giddens recognizes that in modern society, where experts or specialists become involved in the administration and implementation of abstract systems of thought, there is a metalanguage that articulates the circle involving agents and the real world (subject and object). However, since the agents cannot stand outside the social domain, there is also a way in which the actions and understandings of lay agents (who are themselves also elements external to the subject) routinely reenter the universe of experience that represents the historical situation of the subject (Giddens 1990: 14). It is this double-hermeneutic model

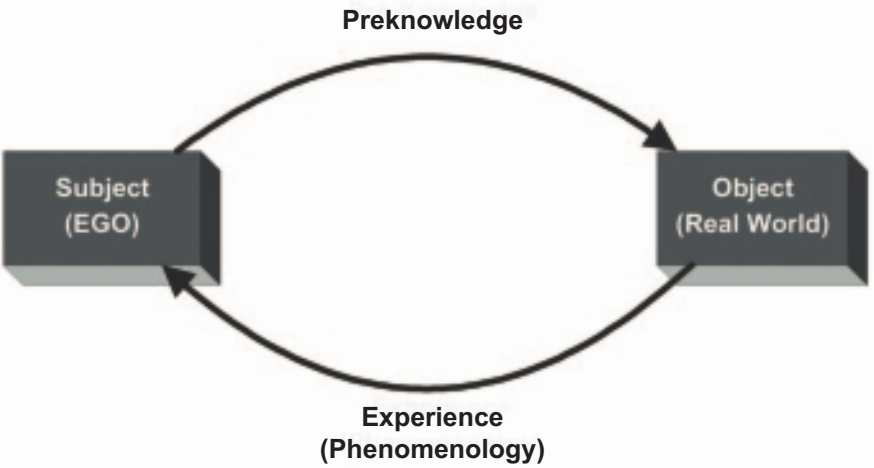

Fig. 2.2. Schematic representation of the place of preknowledge and experience in the relationship between subject and object.

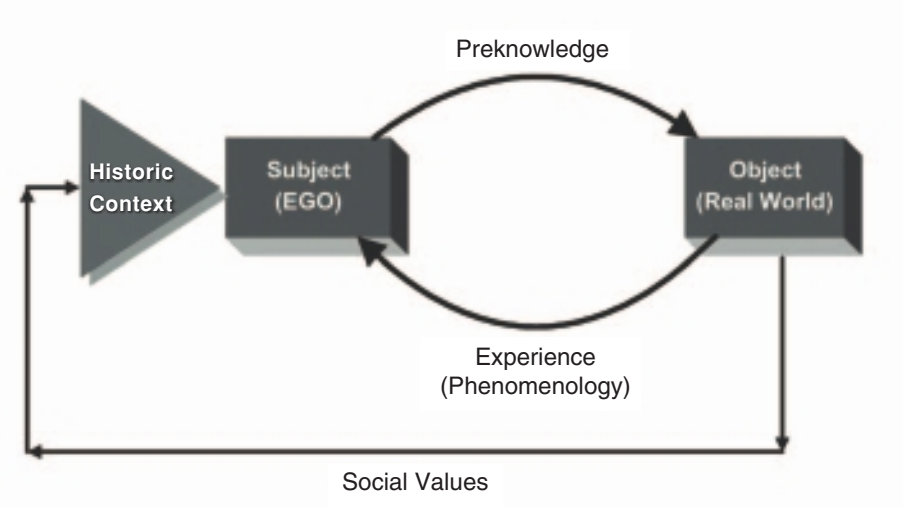

Fig. 2.3. Schematic representation of the place of historical context in the hermeneutic cycle.

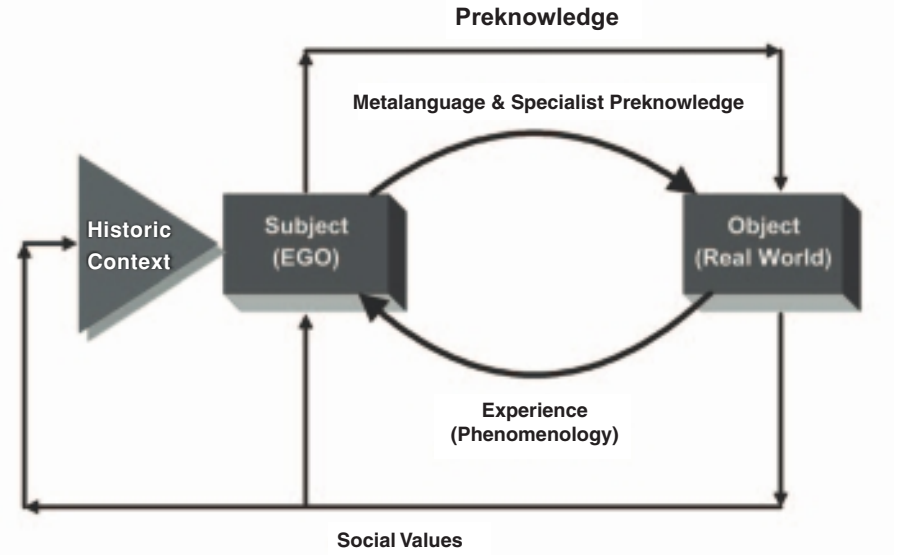

Fig. 2.4. Schematic representation of the place of social values and specialist preknowledge and the relationship between subject and object in the double-hermeneutic cycle.

(figure 2.4), together with the phenomenological basis of experience and the historical situation of the agents, that provides a tool with which to return to the practical matter of how archaeological materials are evaluated and assigned importance or significance.

Applying the hermeneutic model

That the process of valuation in archaeological resource management is historically and culturally situated cannot be denied, and, while generally poorly understood and little debated among practitioners, its overall effect is probably widely recognized. Likewise, the emergence of specialization in the execution of desk-based assessment, field evaluation, and environmental impact assessment procedures has become a fact of life in archaeological resource management within government agencies, and among contractors, consultancies, and archaeological curators. The piece of the jigsaw puzzle that is currently missing is the full use of the parallel or concentric articulation between subject and object inherent in Giddens' thinking about the hermeneutic circle and born of his analysis of modernity and its consequences. I would like to suggest that our thinking on this could be sharpened by visualizing these concentric circles as two systems. Both are abstract in form but have considerable practical utility: a general value system and a specific importance system (figure 2.5). Elements of each can be glimpsed

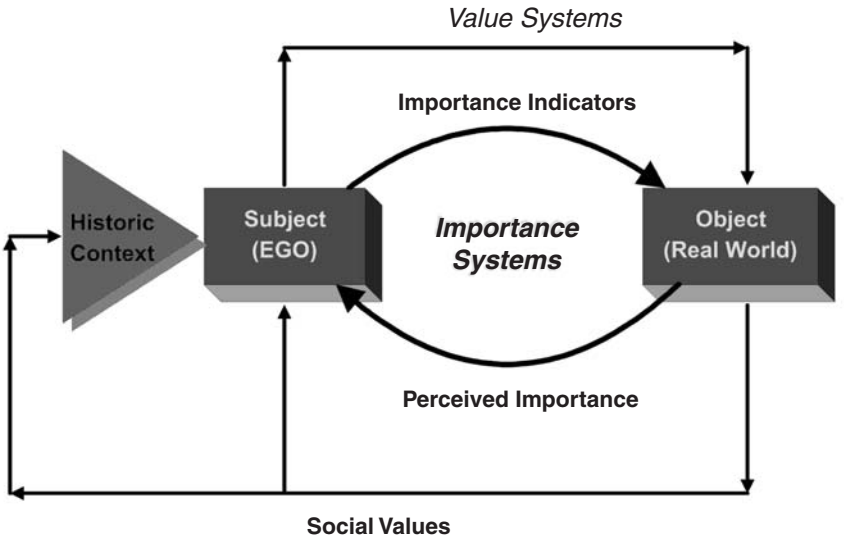

Fig. 2.5. Schematic representation of value systems and importance systems within a generalized model of the relationship between subject and object in the double-hermeneutic cycle.

in archaeological thinking, but deserve to be teased apart, better defined, and set in relationship to the social context in which they are situated.

Value systems in archaeology

The idea of a value system is here conceived in its sociological sense. By this I mean that values are social values, that is, a set of standards against which things are compared and held to be, for example, desirable or undesirable, appropriate or inappropriate, worthwhile or pointless. These standards trigger feelings and emotions and provide the basis for emotional commitment. I have discussed elsewhere how such value systems emerge (Darvill 1995), but here it is important to recognize that they are commonly but not universally held, that they are constantly being renegotiated and changed, and that their formulation and acceptance is a consensual matter. As the hermeneutic model implies, changes in values are not independent of innovations in cognitive orientation created by shifting perspectives on the social world. There is no rational basis for values, and shifts in outlook deriving from diverse inputs of knowledge have a mobile relation to changes in value orientations (Giddens 1990: 44). Three possible sources for the production of values can, however, be seen:

- the logical abstraction of known situations to other situations;
- the application of general social wisdom and assertion; and
- the self-gratification of individuals and groups.

For archaeology, some of the key values that can be identified at present include

- archaeological remains should be preserved rather than destroyed because they represent a direct and tangible link to the past;
- care for the archaeological heritage is good because it brings economic rewards;
- it is better to have archaeological remains than not to have them;
- preservation in situ to maintain authenticity is better than investigation, which is short-term and destroys authenticity;
- visibility is preferred to nonvisibility;
- old things are more interesting than more recent things;
- the archaeological heritage is a collective heritage, owned by no one and available to everyone;
- investigation of archaeological remains is worthwhile because of the knowledge it creates;
- interest in the past brings social benefit in relation to the quality of life, and is a component of education and the process of socialization; and
- the archaeological heritage is a resource that can be used or stored up, as we think fit.

These values (not all of which everyone necessarily agrees with) and the value system to which they relate are generalizing in their constitution. A number of

archaeological value schemes have been proposed, most of which focus on the ways in which archaeological sites and materials are consumed.

In a groundbreaking review of archaeological value systems, William Lipe (1984) considered four types of value (table 2.1). These he linked to a range of interests within society, recognizing that archaeological value is embedded in wider issues, although retaining the notion that cultural materials from the past function as resources in the present. Later, in 1993, I presented a rather different way of treating archaeological materials (Darvill 1993, 1995), which looked at value in terms of three interrelated value sets (table 2.2). The idea of "use values" perpetuated the principle that archaeological materials are resources for immediate consumption. In thinking about the range of possible uses, I tried to reflect on the fact that archaeologists themselves are only one of a wide range of consumers and that we are not concerned about archaeological materials purely out of self-interest. In "defining option values," attention turns to the deferred use of archaeological materials and recognizes not only the conservation ethic of preservation but also the realization that not all possible uses are currently definable. Other ways of using archaeological materials will undoubtedly come along, and our descendants deserve the opportunity to exploit such opportunities. Finally, "existence values" are related to emotional attachments and to things that cannot be directly experienced: the sense of well-being stimulated by knowing that everything is in order; the sense of stability, familiarity, local distinctiveness, and attachment; and the physicality of identity within an historic environment. Each

Table 2.1. Value sets identified for the archaeological resource by Lipe

Value	Context
Economic	Economic potential
	Market factors
	Costs of development vs. cost of preservation
Aesthetic	Aesthetic standards
	Stylistic tradition
	Human psychology
Associative/symbolic	Traditional knowledge
	Historical documents
	Oral tradition
	Folklore and Mythology
Informational	Archaeological research
	History
	Art history
	Architectural history
	Folklore studies etc.

Source: Based on Lipe 1984, Figure 1.

Table 2.2. Value sets and themes identified for the archaeological resource

Value system	Application
Use value	Archaeological research
	Scientific research
	Creative arts
	Education/socialization
	Recreation and tourism
	Symbolic representation
	Legitimation of action
	Social solidarity
	Monetary and economic gain
Option value	Stability
	Mystery and enigma
Existence value	Cultural identity
	Resistence to change

Source: Based on Darvill 1993 and 1995.

of these value sets embraces general socially determined values and relates, to different degrees, to scales of emotion: the pleasures of consumption; the thrill of revelation; the contentment of preservation; the peace of mind in conservation; and so on.

Martin Carver (1996: 46–47) has argued that all the value sets listed by Lipe and Darvill ultimately derive from the realization of the results of archaeological research. He offers, instead, a rather different approach based on the competing interests that reside in the use of a defined piece of land. These he defines as market values, community values, and human values. Archaeology is set squarely in the last of these three groups, competing with the other two for attention. Although this dialectic model tries to recognize the broader social context of archaeology in defining what is valuable, it ultimately fails because it falls back on the myopic position that archaeology is somehow more special than other things. As Carver himself suggests, "The platform that archaeology must argue from must cite moral rewards and human benefits, and do so with such persuasion that the community is willing to suspend its normal basic desire for profit and allow archaeologists access to the land instead" (1996: 48). Thus instead of trying to situate archaeological value within a broader range of social values as others have done (Lipe 1984; Darvill 1995), Carver prefers to ring-fence archaeological interests and set them apart.

Inevitably, the question of how archaeological values work in the wider world is difficult to see from within the profession. It is interesting and instructive, therefore, to consider attempts to look at questions of value in relation to the

archaeological and built heritage from other perspectives. Recent work, for example, has introduced the economist's view and the property market's view (Allison et al. 1996). Here, formal valuation methods have been applied to particular issues. The Hedonic Pricing Method (HPM) looks at changes in the value of property in order to estimate the value of environmental goods. The Travel Cost Method (TCM) is based on the premise that visitors reveal the value they put on a resource by the amount of time or money they are willing to spend in order to see elements of it. In contrast, the Contingent Valuation Method (CVM) relies on questionnaires, which ask people to declare the value they put on different kinds of resources or the existence of some feature. These and other indicators of value operate mainly at the level of the case study, although they potentially provide insights on a far more general scale. In a review of *The Heritage Dividend,* English Heritage (1999) concluded that giving grants for conservation attracted at least matching funding from the private and commercial sectors and that this additional funding was based on desires to enhance cultural distinctiveness and pride of place for local communities, establish local cultural identity, and contribute to the sense of place. At the same time, such work created new jobs and secured the future of others, and created new floor space in formerly redundant historic buildings, which in turn provided opportunities for new jobs and economic revival.

Within the general realm of value systems, there is also the matter of what is considered within the domain of any particular discipline or specialty: what comprises the archaeological resource or archaeological heritage. This determination has both academic and political dimensions.

Academically, the archaeological resource may be seen in terms of any materials that assist in developing an interpretation of the past. In Britain, the traditional core of the archaeological heritage includes familiar enough things: for example, inhabited caves, barrows, hillforts, Roman villas, Saxon churches, medieval villages, and historic towns. More recently, a whole range of previously ignored structures and deposits have also come to be embraced by an expanding universe of relevant materials: for example, hedgerows, peat bogs, valley fills and colluvium, historic parks and gardens, and ancient landscapes (Darvill and Fulton 1998: 12–14). The creation of the archaeological record is in this way a function of the balance between what can be recognized and how society chooses to think about it and classify it (Carman 1996).

Politically, the archaeological heritage is created through expediency and responses to various pressures and social trends. In Britain, increasingly holistic visions of the physical landscape and the developing influence of "Green" politics are slowly changing the place of archaeology in relation to the management and development of both rural and urban environments (Macinnes and Wickham-Jones 1992; Swain 1993). Similarly, increasing interest in military works connected with the First and Second World Wars (Schofield 1998) can perhaps be linked to changing world attitudes toward such matters and the end of the cold

war. In other parts of Europe, as elsewhere in the world, the integration of traditional, Aboriginal, and First Nation interests into broader political agendas provides the basis upon which social values are attached to the cultural heritage.

All of these elements refer to the totality of society and the archaeological resource rather than to any particular component of it; this is what separates the general matter of value from the particularizing question of importance.

Importance systems in archaeology

In thinking about importance, attention focuses not on the place of archaeology as a contemporary academic and political theme but on particular pieces of reality to ask the question, "Is this site more or less important than that one?" Work is done to address the issues that the investigator sets. Importance indicators are set up to mediate between subject and object, the result being the placement of some aspects of the real world within a scheme or scale of perceived importance. The methodologies used and the indicators set are cast in the metalanguage of archaeologists, or of some other special-interest group, although to be effective they will inevitably draw upon and translate appropriate social values.

Two main kinds of importance system are currently being applied in archaeology: quantitative systems and qualitative systems. A general review and annotated bibliography of significance systems used in the United States has been published (Briuer and Mathers 1996), so here attention is focused on European examples.

Quantitative systems and scoring schemes

One of the earliest quantitative systems applied in Britain, and in retrospect a rather innovatory one, was developed by Les Groube to help determine a set of priorities for the deployment of resources in managing the rural archaeological resource in Dorset, England (Groube 1978; Groube and Bowden 1982). Dorset is widely recognized as one of the richest areas in England in terms of the number and quality of prehistoric, Roman, and later monuments. It has been host to many major investigations in the latter half of the twentieth century, including work at Hengistbury Head (Cunliffe 1987), Hambledon Hill (Mercer 1980), Mount Pleasant (Wainwright 1979), Maiden Castle (Sharples 1991), Cranbourne Chase (Barrett et al. 1991), and Bockerley Dyke (Bowen 1990). It is also an area in which the impact of agricultural regimes and urbanization has had an adverse effect on the preservation of archaeological sites. Groube's scheme hinged on determining the position of different kinds of archaeological site or strategy on two scales, a threat scale and a problem scale (table 2.3). These could then be combined to produce a single "priority score." The "threat scale" scored three factors:

a) the physical characteristics of the site type (for example, whether an earthwork or a structure) in relation to typical natural decay trajectories of such remains;
b) the typical land-use situations in which particular site types are found (for example, arable land, pasture, or woodland) in relation to the way that such a land use will accelerate the natural decay trajectories of such remains; and
c) the potential of the site type, in terms of the number of examples known in relation to the number that formerly existed.

The "problem scale" involved the consideration of three factors:

a) the level of problems relevant to particular types of site: whether it is an initial exploratory problem, an integrative problem, or a general theoretical problem;
b) the feedback potential to generate further research questions; and
c) the local relevance, or otherwise, of solving such problems.

Combining these scores allowed different strategies to be ranked. As a result, a survey of the Bronze Age settlement pattern in the county was given highest priority, and the excavation of additional Bronze Age round barrows received the lowest priority (Groube 1978: 49).

This system set the background for the development of a systematic scoring system to help identify monuments in England that should be considered for protection in law by scheduling (Darvill et al. 1987). The main legislative instrument protecting archaeological sites in England is the *Ancient Monuments and Archaeological Areas Act* of 1979, which simply states that monuments included on the Schedule, and therefore subject to the controls set out in the act, are of "national importance." Criteria for the determination of national importance

Table 2.3. Scales and variables developed by Groube for the determination of "Priority Scores" for Dorset's archaeological heritage

Scales	Variables/criteria
Threat scale	Physical characteristics (natural decay trajectory)
	Landuse (accelerated decay trajectory)
	Potential (rarity/loss rate)
Problem scale	Archaeological problem level (exploratory/integrative/theoretical)
	Feedback potential (low/medium/high)
	Local relevance (low/medium/high)

Source: Based on Groube 1978.

Table 2.4. Importance scales and criteria developed for the Monuments Protection Programme in England

Importance scale	Criteria
Characterization	Period (currency)
(applied to specific identified	Rarity
monument classes)	Diversity
	Period (representativity)
Discrimination	Survival
(applied to recorded populations	Potential
of defined monument classes)	Diversity (features)
	Documentation (archaeological)
	Documentation (historical)
	Group value (clustering)
	Group value (association)
	Amenity value
Management assessment	Fragility
(applied to individual	Vulnerability
identified monuments)	Condition
	General conservation value

Source: Based on Darvill et al. 1989.

were first established by the U.K. government in 1983 (DoE 1983; reprinted in DoE 1990, Annex 4), but their systematic application to perhaps 300,000 recorded monuments required a more formal structure to their deployment. What was developed was a nested three-level review of archaeological importance (table 2.4). At the national level, individual monument classes were characterized by applying four criteria. In this, it was recognized that all definable classes of monument included some examples that could be considered as of national importance, so the question was what percentage would provide an academically viable representative sample (compare Startin 1993b). At the next level down, all recorded examples of a particular class of monument had to be ranked to allow the selection of an appropriate number. This discrimination process involved the application of eight criteria. Local populations of a given monument class were ranked by scoring each criterion against the recorded information available for each site. When all the sites were listed in rank order, a threshold could be established based on the results of the characterization process and the best examples of the class identified. Finally, individual monuments singled out for special attention were visited, and the future management regime was determined by considering a third set of criteria: the management assessment criteria. At each stage in the process, the scoring and determination of importance was systematic, doc-

Table 2.5. Value sets and criteria applied in the valuation of archaeological sites as proposed by Deeben, Groenewoudt, Hallewas, and Willems for the Netherlands

Values/importance scale	Criteria
Perception	Aesthetic value
	Historical value
Physical quality	Integrity
	Preservation
Intrinsic value	Rarity
	Research potential group value
	Representativity

Source: After Deeben et al. 1999, table 1.

umentable, consistently applied, and repeatable. Although it was a point-in-time assessment of importance, the process allowed decisions to be revisited as and when required. Professional judgment was given an important role throughout the procedures in order to overcome inconsistencies in the records available and consider issues not covered by the defined criteria (Startin 1993a: 194–95, 1993b).

Subsequently, the Monuments Protection Programme (MPP) monument evaluation system was applied in slightly different circumstances to assess the importance of individual recognized monuments within large-scale development schemes, for example, in the case of a proposed new visitor center for Stonehenge (Darvill 1991: 82–90). The general principles were also carried over into the development of a scheme to assess urban deposits in Cirencester, Gloucestershire (Darvill and Gerrard 1994). Here, zones of high, medium, and low archaeological interest within the town and its hinterland were determined on the basis of generalizing scores generated through a detailed review of available results from archaeological interventions such as excavations, watching briefs, and recorded observations, combined with a study of the main available historical sources. A variant was also used in mapping the landscape around Stonehenge (Batchelor 1997). In an area of 135 square kilometers, scores developed for individual monuments were combined with data on the distribution of flintwork recorded through systematic field survey. The resultant map provides a visual representation of areas of high, medium, and low importance in the whole landscape.

The step-by-step process inherent to the MPP scheme, in which valuation is separate from selection, can also be found in a method proposed to deal with monuments and deposits in Holland (Deeben et al. 1999). In this scheme, the criteria are arranged into three groups (table 2.5): perception, physical quality, and intrinsic value. Each criterion is scored on a three-point scale to provide a general ranking.

Qualitative approaches

Qualitative models of archaeological importance lend themselves to area mapping rather than to the consideration of individual sites or monuments. One pioneering study relates to York in the north of England (Ove Arup and Partners et al. 1991; Carver 1993: 13–15; also see Grenville and Ritchie, this volume). The city is well known for its tremendous wealth of archaeological deposits representing over 2,000 years of settlement, including superimposed Roman, Anglian, Anglo-Scandinavian, medieval, and later layers, which in places reach a total thickness of more than thirteen meters. In this study, the archaeological importance of a site was defined as a function of the quality of the archaeological deposit present and the potential of the deposit to meet the needs of current research. The quality of the deposits could be conceptualized in terms of their "legibility" using the available techniques of archaeological investigation. The needs of current research could be defined through the development and agreement of a rolling predefined research agenda. In the study, thirty-five areas within York were examined and compared; two were found to be of little or no archaeological interest, while the other thirty-three contained deposits deemed of high quality. In the conventional wisdom enshrined in archaeological legislation and planning guidance, areas or sites of high archaeological importance should be preserved for the future. However, using the York model of archaeological importance, Martin Carver has argued that "sites of high research value should be dug; the rest conserved" (1996: 54). This line of reasoning has started a debate that rather usefully highlights the relationships between general social values and archaeological views of what is important (compare, Grenville and Ritchie, this volume).

In another domain, landscape assessment and the allied topic of countryside characterization also lend themselves to qualitative studies of importance. Lambrick (1992) provides a preliminary view of what he called "Landscape Integrity" assessment as a means of combining the value of the aesthetic with the analytical modes of evaluation. This involved a two-tiered approach to judging the historic value of landscape in terms of features and areas. Other rather promising attempts at providing evaluative maps of the landscape are being developed through experiments with historic landscape characterization (Fairclough 1999).

Other approaches

In many of the cases already cited, both quantitative and qualitative, the matter of importance is determined using principles derived from other disciplines, including, as John Carman has pointed out (this volume), accountancy and economics. It is surprising, therefore, that little attempt has been made to introduce some of the concepts of environmental economics to the discussion of archaeological importance. Traditionally, this hinges on the notion of "environmental

Table 2.6. Comparison of the key characteristics of value systems and importance systems

Value systems	Importance systems
Macroscale	Microscale
Top-down	Bottom-up
General orientation	Specific orientation
Conceptual	Pragmatic
Production	Consumption
Inspired by the past	Looking to the future
Widespread	Local
Society-based	Specialist-driven
Holistic	Atomized

capital," which can be conceived as consisting of assets that can provide a stream of benefits or services. Such assets are usually divided into "critical," "constant," and "tradable" capital to reflect an intuition that some things are more important and less replaceable than others. However, this emphasis on things or features has recently been challenged, and the suggestion made that there should instead be a greater focus on the functions that assets provide in terms of human well-being: What are the benefits and services that environmental things provide to society (CAG Consultants 1997)? How exactly such a model translates into archaeological practice remains to be seen, but its greatest potential deployment is in connection with the integration of archaeological resources with the concept of sustainable development (English Heritage 1997).

Comparing importance systems and value systems

When viewed side by side, the characteristics of what are presented here as value systems are very different from those of what are here called importance systems; indeed many of the characteristics of these two systems are almost opposites (table 2.6). Thus, on the one hand, value systems are generally holistic and conceived on a macroscale; they have a general orientation, largely relate to the production of archaeological resources, and are conceptual, widespread within the population, and generated with reference to past experience from the top down. By contrast, importance systems are atomistic, relate to the microscale, have specific orientations, are generally pragmatic, relate to the consumption of the resource, look to the future, have local relevance, and are created and administered by specialists.

While it is easy to emphasize the differences, it must also be remembered that these two systems interlock in two places: with the subject and the object. Value systems provide an aspect of the preknowledge of the expert formulating the

importance indicators, the pursuit of which in turn become recognized and absorbed within the real world, thereby contributing to the dynamics of the value system as well as supplying insights into the perceived importance of those elements of the real world that are of interest to the subject. In this way, knowledge or meaning claimed by specialist observers rejoins its original subject, altering it in the process. Thus reflexivity, the continual redefinition of being, does not stabilize the relationship between subject and object but rather provides momentum for continual redefinition. When thinking about value and importance systems, it is critical to recognize that they are never stable.

The application of a hermeneutic model to the question of importance and value in archaeological practice emphasizes the dynamic state of affairs, and opens up three sets of implications. First, in using knowledge for the decision-making process, an individual or organization is likely to draw on two interconnected systems of knowledge, a general value system and a professionally determined, or interest-group determined, importance system. The relative weight given to each will depend on where that individual or institution is situated and the historical context at the time.

Second, because preknowledge and the nature and extent of experience differs between individuals and organizations, the orientation of importance systems will inevitably also differ. It is in the nature of importance systems that they have specific orientations, and these will, according to this model, be tied back to preknowledge. Thus, the importance systems developed for the MPP were specifically oriented to develop an understanding of the perceived importance of things that could be dealt with under the prevailing ancient monuments legislation in England. As part of that process, preknowledge and a received value system guided the development of the program. As such, it was widely recognized that the importance system as it stood did not deal adequately with all kinds of archaeological remains. The same applies in reverse to Martin Carver's proposals, developed in the light of experience in the city of York. Here, rather different received value systems provided the preknowledge for the formulation of importance systems. Not surprisingly, therefore, the importance systems that were developed are very different. They have a distinct set of orientations, which are peculiar to a set of circumstances. Neither the MPP scoring system nor the York-inspired system has universal application; in fact, taken together, they are rather complementary. Ontologically, each focused on a different conception of the existence of archaeological remains (monuments for the MPP, and deposits for Carver), yet, if asked to define the archaeological resource as a totality based on current knowledge, many archaeologists would probably include both notions.

Third, the creation of importance systems carries with it the implication of incorporating and reflexively redefining preknowledge, at least some of which relates to widely applicable value systems. Where that preknowledge comes from might usefully be the subject of critical review in some cases. The value systems to which it relates will be socially specific, and thus the dangers of applying values

systems cross-culturally should be recognized and taken into account. If we follow Galbraith in accepting that the reflexive mode of redefining values results from "a persistent and never-ending competition between what is relevant and what is acceptable" (1958: 9), then as archaeologists, we should perhaps pay more attention to the development of importance systems that mirror fairly closely those things that can be recognized in the more widely held value systems.

Conclusions

In conclusion, in this paper, I have attempted to step behind archaeological practice to look at its broader social context. I have used what I hope is a fairly familiar hermeneutic model of social action in a contemporary application to tease apart some of the issues and explore what we are doing when we use these widely held notions of "value" and "importance" in the context of decision making at various levels. As a result, I have argued for a distinction between "value systems," as a set of socially defined orientations applicable to the whole resource, and "importance systems," as an archaeological or interest-group methodology applicable to specific elements of the resource, in order to allow some kind of ranking or discrimination. It is suggested that there is no universal system or methodology that can or should be applied, but rather a series of specifically oriented schemes relevant to particular needs. Moreover, the successful development, and widespread acceptance, of comprehensive and easy-to-apply importance systems hinges on the dynamic coincidence of archaeological interest with more general value systems.

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3

Good citizens and sound economics

The trajectory of archaeology in Britain from "heritage" to "resource"

John Carman

Introduction

One of the often unstated themes of any discussion of issues in cultural resource or heritage management is the difference between those who understand the object of concern to be "stuff," comprising objects, monuments, landscapes, and ideas about such things from the past, and those who think of it as a field of "practices" in the present. This is a crucial difference, although not much discussed and often confused, sometimes perhaps deliberately so. At the same time, there is a distinction to be drawn between those who bring an a priori agenda to bear in their comments upon heritage matters and those who attempt simply to understand the phenomenon. The difference is between those who talk about what the heritage should be and those who try to understand what this thing is in all its complexity. Researchers in the field of archaeological heritage management fall into the latter category; their aim is to understand the nature of the heritage project in the contemporary world, and in particular in relation to the field of archaeology.

The word "heritage" has only recently taken over in Britain to describe what heritage managers are concerned with; elsewhere, the idea of ancient remains as a "resource" is far more common. Even where the term "heritage" is preferred, as it is in the United Kingdom, the current tendency is to think of it in terms of use values, and therefore as a kind of resource. Use of the term "heritage" has grown very rapidly in the United Kingdom since it burst onto the scene as a legal term, internationally (Council of Europe 1969; UNESCO 1972a, 1972b; OAS 1976), nationally (National Heritage Act 1980, 1983), and subsequently as part of the idea of "the heritage industry" (Hewison 1987). The idea of the thing we call heritage has a slightly older pedigree, but the belief that preserving things from

the past is a good and worthwhile thing to do is (in Britain) only just over a hundred years old. There are some inklings of it earlier in Britain, and elsewhere it has a slightly longer pedigree, but it appears in the form of concerted action only in the later nineteenth century. The justifications at that time are couched in almost exclusively social welfare and political terms. This contrasts with the modern language of cultural resource and heritage management, especially as applied in archaeology, which is almost exclusively economic in tone. In this chapter, I will examine the values ascribed to the cultural phenomenon now called heritage by outlining the historical trajectory of the concept from its emergence in Britain in the late nineteenth century to the present. The original purpose of creating what we now call heritage will be contrasted with its current place in our cultural frame.

A brief history of archaeological values in Britain

Making good citizens for the modern age

In the late nineteenth century, archaeology was at the heart of disputes about the way the future would look (see also Carman 1996: 67–96, 1997). One work in particular dominated from the time of its first publication in 1865 until at least World War I. In fact, it was still being very widely read and consulted as late as the early 1960s, a total shelf life of nearly a century. The book is John Lubbock's *Prehistoric Times* (Lubbock 1872), the first great synthesis of European prehistory in English. The book opens with a discussion of the antiquity of bronze and iron weapons found in Europe and their priority over written evidence. It gradually moves backward in time, through the ages of iron, bronze, and stone, to a consideration of the great antiquity of the human species. Then, reversing the sequence, Lubbock cites the untrustworthiness of historical and traditional sources in explaining prehistoric finds (Lubbock 1872: 424), but urges instead the usefulness of ethnological parallels (Lubbock 1872: 428). In the second part of the book, he then proceeds by moving forward in time, comparing what he calls "modern savages" with the finds of archaeology. The ultimate purpose of the book is explained in the final chapter.

In these "Concluding Remarks" to *Prehistoric Times,* Lubbock connects improvements in physical welfare to increases in population and vice versa (Lubbock 1872: 593–94). These in turn are linked to the mental condition of the members of a society, since "the pleasures of the civilized man are greater than those of the savage" (Lubbock 1872: 597). All this is then given support by citing the inverse correlation between literacy and criminality as evidenced by data from British prisons (Lubbock 1872: 600). Drawing on Darwin, he argues that natural selection works to advance both physical and moral conditions over time, and that science (in the sense of learning) makes people more virtuous (Lubbock 1872: 601). Accordingly, advances in learning lead to a greater understanding of nature, to technological advance, and thus to increased happiness. Then, bril-

liantly reversing the argument, Lubbock leads us to the conclusion that scientific advances will necessarily lead to both physical and moral improvement among modern European populations. It follows from all this that "Utopia turns out . . . to be the necessary consequence of natural laws" (Lubbock 1872: 603), and the proof of this lies in the archaeological and ethnographic record.

This is in essence a statement of late nineteenth century Liberal politics with a time dimension added. Lubbock was a Liberal politician and elected Member of Parliament as well as an archaeologist. He was one of a new breed of rising middle-class professionals (Perkin 1989; Carman 1996: 70–89) who assisted in the creation of the distinct disciplines of archaeology and anthropology by classifying and defining appropriate behavior patterns for these new sciences. He was also the prime mover in legislating the preservation of prehistoric monuments and active in promoting the scientific education of the wider public. Eight times between 1873 and 1880, he proposed a bill that would have preserved certain ancient monuments by law. These attempts at legislation all failed, and the reasons include the entrenched opposition of the landed interests (Chippindale 1983: 13; Saunders 1983: 11). In 1882, however, Lubbock was able to force a vote of the House of Commons that committed the new Liberal government to propose a bill of its own. It was this bill that became the first legislation in Britain to preserve ancient remains and the beginning of what today we call heritage. *Prehistoric Times* should accordingly be read as a strategy in contemporary politics whereby a scientific explanation of how human society functions gave support to the Liberal political program of national public education and welfare.

Others, however, did not accept any connection between technological knowledge and moral condition. "Man has always been Man" so far as mental powers are concerned, and nothing less. So said the Duke of Argyll (1870: 150) in his reply to Lubbock, which he called *Primeval Man: An Examination of Some Recent Speculations*. In this work, he cited the lack of hard evidence for human progress and the copious evidence for the decline of civilizations into savagery and barbarism. Similarly, although at a later date, Peter Kropotkin in his book *Mutual Aid* (Kropotkin 1972 [1902]) set up a vision in direct opposition to that of prevailing Liberalism. Kropotkin argued that the medieval commune, at the heart of which lay the guild, was a free association of artisans and workers organized from below without coercion or state intervention (Kropotkin 1972 [1902]: 162). The evidence that this form of social organization culminated in "the greatest development of human intellect" lay in the legacy of medieval city architecture (Kropotkin 1972 [1902]: 184):

> The [medieval] cathedrals . . . [displayed] a purity of form . . . which we now vainly try to attain. . . . If the medieval cities had bequeathed to us . . . nothing . . . but the monuments of building art, . . . we might yet conclude that the times of independent city life were times of the greatest developments of human intellect. (Kropotkin 1972 [1902]: 183–84)

These three volumes, *Prehistoric Times, Primeval Man,* and *Mutual Aid,* encapsulate late nineteenth century discourse about heritage, and in doing so, they are all statements of political belief wrapped in a scientific framework. Lubbock argued for the Liberal vision of progress and educational welfare led from above. Argyll argued against the capacity for human improvement in favor of maintaining the aristocratic status quo. Kropotkin argued for radical libertarian change. Although all referred to the "natural" condition of humanity, drawing on archaeology, history, and ethnography for their foundation, they were nevertheless not arguments about history, prehistory, or ethnology but about what to do here and what to do now. What we now call heritage was recruited to support programs of public education and welfare, and of political and social advancement. The same applies to the foundation of such organizations as the National Trust (Gaze 1988) and the growth of public and private museums (Hudson 1987; Hooper-Greenhill 1992), which were dedicated to the "improvement" of the rural and industrial working classes. In the later nineteenth century, the discourse of heritage was always about politics and society: it was about making good citizens.

Making strong nations for a secure world

The tradition of "Liberal" thinking about the public role of archaeology by archaeologists continued well into the twentieth century, albeit altered. At the outbreak of World War II, Grahame Clark published the first edition of his *Archaeology and Society,* a book intended to "describe [to a lay audience] the processes of archaeology, its aims, its limitations and its social value" (Clark 1939: viii). Much of the final chapter of the book is a discussion of the role of archaeology in building new nations and rebuilding old ones after the catastrophe of World War I. In Poland, archaeological work "can heal the wounds of cruel partitions" (Clark 1939: 190). In China, "the combination of national awakening and archaeological research can be observed on a gigantic scale" (Clark 1939: 191). In Eire, "the free development of archaeological research is the finest imaginable propaganda for the liquidation of partition and the full achievement of Irish nationality" (Clark 1939: 194). Clark's ultimate point is that archaeology requires a heavy investment by the state, since archaeology "has outgrown private enterprise. To be conducted adequately . . . it must be a social enterprise supported by the entire community" (Clark 1939: 211). Throughout, the idea of community is synonymous with that of the nation-state.

The second and substantially revised edition appeared in 1947. In this edition, the argument is largely the same, but the emphasis on the role of archaeology in nation-building is even more emphasized. In part, it is a reflection of the perceived need to rebuild not only nations but the world itself, shattered by World War II. "It is only through the reconciliation of and integration of coherent nations that any world community can be realized in the foreseeable future. . . . The essential point is . . . that in a liberal world the operation of national . . . sentiment can . . . serve only to enrich society" (Clark 1947: 202). Accordingly, "archaeol-

ogy may contribute to the integration of society not only by strengthening local ties and fostering patriotic sentiments, but, if allowed to develop freely, by promoting a fuller realization of the underlying solidarity of the human race, upon which the possibility of a world order ultimately rests" (Clark 1947: 203). A few years later, this need for a stable world order grounded in its material historical legacy gained international status under the United Nations Educational, Scientific, and Cultural Organization (UNESCO) Convention for the Protection of Cultural Property in the Event of Armed Conflict (UNESCO 1954); this idea underlies subsequent international laws on the cultural heritage (for example, Council of Europe 1954, 1969; OAS 1976; UNESCO 1972a, 1972b). In the mid-twentieth century, the discourse of heritage was still about politics and society, but it was transformed: instead of being about good citizens, it was now about making good nations and a stable international order.

Commodification and justifications for a new millennium

The current idea of heritage as a commodified past is one that is commonly held. It is reflected in the interest in tourism shown by archaeologists (Boniface and Fowler 1993), and it is the central thesis of works well known in the heritage field (Hewison 1987; Lowenthal 1985, 1998). Tourism also provides one of the great justifications for the preservation and management of archaeological remains globally (Cleere 1989: 9; in the U.K., Hunter and Ralston 1993: 249–50; Darvill 1987: 164–66; in Australia, Smith and Clarke 1996: 109–19; in South Africa, Spiegel 1994: 191–93; in Papua New Guinea, Blacking 1990: 160–72; in relation to former Nazi death camps, Beech 2002).

This emphasis on the economic is reflected also in the way archaeologists justify to themselves and to others the preservation of ancient remains. The formal procedures for deciding what shall be preserved from all the things surviving from the past are remarkably uniform across the world. The argument for selection in the first place is grounded in the belief that if "we were to declare that all cultural materials . . . were to be preserved our societies would undoubtedly come rapidly to a halt, and we would soon stifle in our own refuse" (Lipe 1984: 1); it "would be utopian to consider that all cultural resources must be preserved in perpetuity—nor, indeed, would it be in the interests of contemporary and future societies. . . . [Accordingly] selection of the best and representative is imperative" (Cleere 1984: 127). In this way, material from the past is brought into a realm of competition, the prize for the most valued being survival.

The standard approach across the globe is to establish sets of criteria whereby the relative value of any site can be compared with the relative value of another, usually similar, site. In Britain, the secretary of state's eight criteria for establishing the national importance of monuments (and thus their suitability for inclusion in the Schedule of Ancient Monuments) has been further developed and refined by the Monuments Protection Programme (Darvill et al. 1987). In the United States and Australia, the standard to reach is that of significance, which is

measured by sets of suitable criteria (Schaafsma 1989; Bruier and Mathers 1996; Smith 1996). Having been developed and refined in these territories, the idea of evaluating the remains of the past by formal means is being rapidly disseminated across the globe: to Europe (Deeben et al. 1999), Africa (Wester 1990), Asia, and Latin America. In efforts to theorize these practices, commentators on the notions of value applied in archaeology inevitably call upon schemes derived from economics. A present and growing focus on sustainability draws upon ideas taken from environmental and development economics (for example, Young 1992) to provide a framework within which archaeological remains find their place and are provided with appropriate functions that will simultaneously benefit the community and allow their continued survival.

This is a fundamentally different way of thinking from that evident in earlier decades. Instead of a concern with public welfare, that is, with society and politics, it is a concern with the exploitation of archaeological remains as an economic resource. Archaeological sites and monuments are measured and assessed for their value relative to one another against the various practical and productive uses to which they can be put. Instead of being about good citizens, strong nations, or a peaceful world, the discourse of heritage as we enter the third millennium is about value for money and effective use. It is about sound economics.

Current value schemes

This concern with economics is expressed in the dominant language of value as applied to archaeological remains. Three such schemes of value can currently be identified; they are usually treated as mutually exclusive, and each performs a different function. Each scheme has its adherents and its adversaries, its uses and abuses; each also has its source in a discipline outside archaeology, although these sources are rarely acknowledged. Two of them draw upon ideas from economics, but the third contains echoes of the nineteenth century origins of heritage.

The accounting school of value

That there is today a flourishing trade in antiquities is well known. What is perhaps less well known is that museums in some parts of the world are being required to behave toward their collections as if they were items for sale: to place a financial value or price on them. This is currently the case for financial reporting purposes in Australia, where the provisions relating to assets in Australian Accounting Standard AAS29 on "Financial Reporting to Government Departments" became operative in July 1997 and requires precisely this type of valuation for "assets [which are] 'difficult to measure'" (AARF 1993; 1995).

This approach is grounded in the notion that museums are public institutions and thus need to justify their expenditure of public money by showing how valuable they are to the community. It is held that a financial measure is an appropriate one and that such a valuation makes the activities of the institution

more transparent. Several ways of measuring the financial value of museum collections have been put forward by accounting professionals, and discussion of the merits and demerits of this system has therefore largely been confined to the literature of accounting, particularly in Australia (compare, Carnegie and Wolnizer 1995, 1996, 1997; Hone 1997; Micallef and Peirson 1997; but see also Carman et al. 1999). This system currently applies only to museum collections, but there is no reason why the approach cannot be extended to other types of collections, including sites and monuments in state care, or those protected under scheduling provisions or as national monuments or in national parks (Micallef and Peirson 1997: 32 and 36). Placing a market value on antiquities is also justified as part of a campaign for a licit international trade in ancient objects (Merryman 1994). The charge of commodification leveled at the proponents of such a trade is challenged on the grounds that "there is a close relation between art world consensus about artistic value and market value," and these tend to change together (Merryman 1994: 55); the commodification objection to the licit market is thus no more than "an effete prejudice" (Merryman 1994: 55). Where a market value is not available (as, for example, where no market exists for an item), alternatives have been proposed (see Carman et al. 1999: 144).

The main advantage of this accounting school of value is that it recognizes the value of cultural objects on a universal scale. It also gives archaeologists a medium whereby they can deal with others, since financial terms for the purchase of items can be offered. This is effectively the system operating in Britain in respect of the law of Treasure (Department of National Heritage 1997: 25–29). Other means of a similar kind include the offer of financial inducements to desist from looting or damage, payment for access to sites and material, and offers of employment as part of a research team. The disadvantage of such a value scheme is that it represents a very narrow sense of the idea of value.

The economic school of value

There is sometimes a tendency among archaeologists to be scornful of the "dismal science" of economics, based upon the misconception that all that economists care about is money. This is not necessarily true, as economists take a sophisticated approach to questions of value, grounded in the recognition of the environment as a scarce (that is, finite) resource.

From the perspective of economics, the environment comprises both renewable and nonrenewable elements (Young 1992: 9; Brown 1990), and most economic efforts have been put into considering renewable and potentially renewable components (Young 1992; Orians et al. 1990). This approach is of limited help to archaeologists, who consider their material to be finite and nonrenewable (Cleere 1984: 127; Darvill 1987: 1; McGimsey 1972: 24). Nevertheless, the general scheme of value applied by economists has been borrowed for application in archaeology. This scheme recognizes two main types of value: "use values" and "non-use values" (Young 1992: 23), sometimes called "non-consumptive val-

Table 3.1. Darvill's value systems for archaeology

Use values	Non-use values	
	Option values	Existence value
Research	Social stability	Cultural identity
Creative Arts	Mystery and enigma	No change
Education		
Recreation and tourism		
Symbolic value		
Legitimization of current action		
Social solidarity		
Monetary gain		

Source: Based on Darvill 1995.

ues" (Brown 1990: 214). Included in non-use values are types of "future uncertain non-consumptive value" (Brown 1990: 214–17), such as, "option value" (Young 1992: 23), "existence value," and "bequest value" (Young 1992: 23; Brown 1990: 215).

These types of value have been introduced to archaeology especially by Darvill (1993, 1995), who approaches value by providing lists of the specific types of value that fall under each heading provided by the economists (table 3.1). Under use value, he lists those of "archaeological research," "scientific research," "creative arts," "education," "recreation and tourism," "symbolic representation," "legitimation of action," "social solidarity and integration," and "monetary and economic gain" (Darvill 1993: 12–20; Darvill 1995: 44–45). Under option value, he lists "stability" and "mystery and enigma" (Darvill 1995: 46–47), and under existence value, he lists "cultural identity" and "resistance to change" (Darvill 1995: 47–48). Exercising the option latent in an option value converts that value into a use value; option value is therefore no more than a deferred use value. The same, however, applies to existence and bequest values; these, too, are simply deferred use values because they describe uses that may be acted upon in the future. In fact, all these apparently different values represent the productive, but not necessarily destructive, use of the item in question; the only doubt relates to when that use will take place and what type it will be.

In other words, the "economic" school is concerned with what benefits individual components of the heritage are able to provide. This is essentially the approach taken in schemes that attempt to assess the importance of sites in the United Kingdom (Darvill et al. 1987), or their significance elsewhere (Bruier and Mathers 1996). It is a scheme that assumes various alternative uses for a site or a body of material, which is exactly Martin Carver's (1996) starting point in his consideration of archaeological value. This is the approach taken by economists, who recognize that, since the value with which they are concerned only arises at the point of making a decision, "different decisions may require different con-

cepts of value and [thus] different valuation methods" (Sinden and Worrell 1979: 411). Here, it becomes evident that the values measured or recognized by economists always relate to the comparison of one thing with another, which is exactly what "archaeological significance testing" is deemed to be about (Startin 1993; and compare Baudrillard 1981: 29, who calls all such values "exchange values").

The advantage of this comparative economic approach to the value of the heritage is that it gives us a usable list of very tangible purposes for having a heritage and treating it as something different from anything else. The disadvantage is that it lifts the heritage into the powerful realm of economics where other noneconomic schemes of value have far less authority.

The social school of value

An alternative to these is the belief that the fundamental purpose of the heritage is simply to be the heritage. The institutions that we have established to create the heritage, museums, laws, academic disciplines, are all concerned with setting the heritage up as something above and beyond the ordinary, outside the realm of accountancy, "the audit society" (Power 1997), and the economic.

Individuals and societies have at their disposal both "cultural" and "economic" types of capital, which are convertible into one another (Bourdieu 1984). The conversion can be effected either directly by individuals via the exchange of knowledge and the use of social position to find more lucrative employment, or more indirectly via the acquisition of commodities, which either have or can be manipulated to acquire symbolic cultural value (Baudrillard 1981) (figure 3.1). Thompson's (1979) "durable" and "transient" types of values can be held to

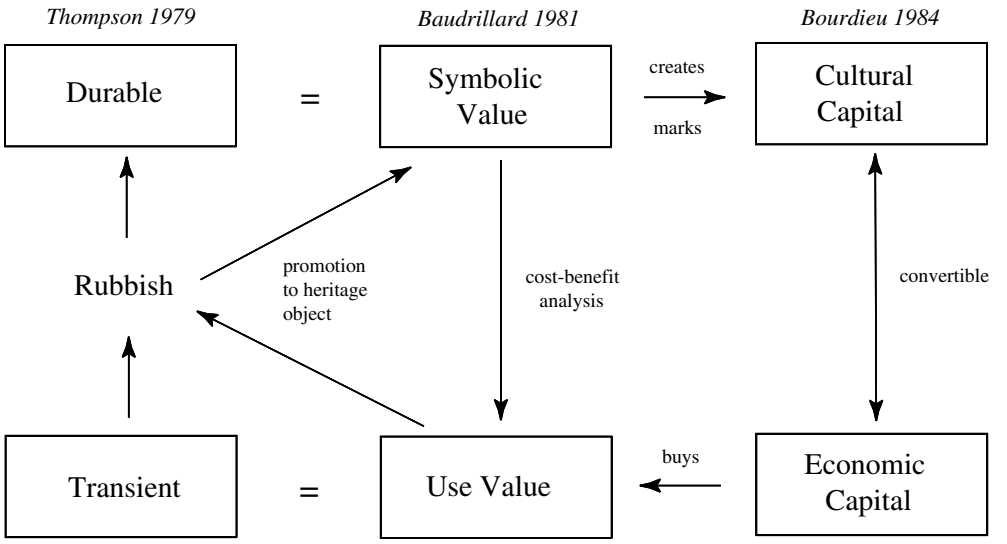

Fig. 3.1. "Public" heritage values.

equate with Baudrillard's (1981) "symbolic" and "use" value realms, and the dynamic of Thompson's *Rubbish Theory* (1979) provides a model of the process by which the conversion from economic to cultural capital is achieved: essentially, one of promotion (Carman 1990). Objects with this symbolic value both mark and serve to create a stock of cultural capital. The reconversion of cultural capital to economic capital is the process by which the symbolic value of the object is (by Baudrillard's 1981 "cost-benefit analysis") turned back into use value, which is then susceptible to measurement and comparison per Darvill (1993, 1995) and Carver (1996), or to the measurement of site significance (Bruier and Mathers 1996). However, this reconversion to use value reverses the initial promotion to cultural status. In other words, after having promoted selected things out of ordinary life into a special realm where they carry special meanings, to assess or evaluate them we then have to remove them once more from that special realm and thus remove the special meanings they carry for us. In the process of evaluation, heritage items are required to be stripped of the very characteristic that made them heritage in the first instance.

This scheme of "social" value should not be seen as the promotion of Darvill's (1995) "symbolic" or "research" values to overarching importance, or simply as the acceptance of Carver's (1996: 53) assertion of the importance of research over and above everything else. The difference is that in Darvill's scheme, different values vie with each other, and in Carver's, archaeological research vies with other possible uses of land. The social value approach does not ask what the purpose is of the individual components of the heritage, but what the purpose is of the heritage as a category. The answer, derived from philosophers and social theorists (Thompson 1979; Douglas and Isherwood 1979; Baudrillard 1981; Bourdieu 1984), is that heritage is there simply to be important and to be kept. It is a form of corporate saving, possessing the "otherworldly morality" recognized by Douglas and Isherwood (1979: 37). In other words, the archaeological heritage has nothing to do with financial quantification, or with productive use however defined. It is meant to be (in the fullest and best sense) useless; it is also priceless.

The force of this approach lies not in the intellectual application of a narrow reason (as in the accounting and economic schools), but in its appeal beyond reason to our sense of what is right and proper. It is a social argument, appealing directly to the nature of our society as a community, exactly the purpose for which the heritage, as a category, was created over a century ago. This approach is not intended to help us decide what things to keep in particular sets of circumstances, but to remind us of the point of having a heritage at all. It places the idea of heritage back in the political arena, from which it emerged and where it belongs, as a device to help us decide who we wish to be (however we wish to define "we," what values we wish to subscribe to, and what our society should be like now and in the future). In arguing about our heritage, we also discover and rediscover our history in all its complexity and intricacy, with all its complica-

tions, contradictions, and shades of light, dark, and gray. In such a value scheme, the heritage is seen not as an object to which to apply procedures, however sophisticated, but as a social phenomenon in its own right, with a history of its own and purposes beyond those of mere convenience. As a social force, heritage has the power to disturb us and make us think about how we wish to live. In doing so, it takes us beyond accounting and the economic.

Conclusions

Those who can be considered the "inventors" of heritage in Britain were concerned with real people. They sought to improve the everyday lives of real people by introducing them to ideas about how the world could be improved, derived from studies of the past. Their successors took us away from that into a concern with more abstract notions: the nation-state, the world order. Archaeology as a social resource was to be utilized to construct a collective welfare. The trajectory of our own age has been deeper into abstraction: into a discourse deriving from the sometimes abstruse language of economic thinking. The public use of archaeology is increasingly divorced from people and absorbed into bureaucratic agencies. It is carried out by specialists, who work on behalf of (but not for) the public they serve. Although we have gotten better at what we do, we have also lost our way and forgotten what heritage is for.

As well as moving into increasingly abstract realms of relevance, the field of heritage has become increasingly normalized. In the later nineteenth century, the preservation of ancient materials and their use for public education was a fairly radical agenda, sometimes open to violent challenge in the public arena. Even in the mid-twentieth century, the idea of preservation had still to be argued for, and it would be several decades before there was full international agreement on heritage conservation as a necessary state function. Today, there is universal agreement on the value of heritage. We know what it consists of: talk to anyone and use the term "heritage" or any of its equivalents in other languages, and in general people will know what you mean. There is widespread agreement as to what a heritage can be used for and those things where its use is illegitimate. The idea that the heritage is valuable and its preservation useful is no longer part of political debate. Arguments may rage over specific components, such as the fates of "Kennewick Man" or African American burial grounds, but not about the concept itself, which is usually accepted without question.

Instead, heritage has become a set of mere practices, which are conducted properly or inappropriately; as one archaeologist has put it, heritage is merely "applied archaeology" (Embree 1990: 31). Open any textbook on heritage, and it will tell you how to identify and record the heritage, how to evaluate it, how to interpret it, and how to present it to the general public. While we may differ on the specifics of each of these functions, there is no disagreement as to the functions themselves. These we accept as common, basic, unchallengeable. Heritage

has ceased to be a project and has become merely a collection of "stuff" that we treat in a particular way—and in an increasingly homogeneous way all over the globe, especially so as programs of international development and cooperation include the archaeological heritage within their scope. Heritage has become a realm of bureaucracy and of standardization. It is no longer about anything that really matters. Instead, it is a resource to be used for some purpose external to itself.

As the third millennium progresses, it may be time to reconsider the path we have been treading over the past hundred or so years regarding our cultural heritage. It began as a matter of politics and ethics. There was disagreement about its purpose and its value for that purpose. We seem to have reached a stage where we forget to ask about purpose and are more concerned with performance. That is why the concern of some researchers is not with heritage as "stuff," nor with an a priori understanding of what heritage is about, but with gaining an understanding of the heritage "project" in the world. It is important to know why we have a heritage and what having a heritage does. This chapter is accordingly not a statement about a body of stuff: it is a call to action, for us to start seriously researching the field of heritage in ways that help us understand what this thing we so blithely manage actually is, what it does, and how it does it.

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4

Shaping and suppressing the archaeological record

Significance in American cultural resource management

Joseph A. Tainter and Bonnie Bagley

One characteristic of contemporary archaeology is the emergence of perpetual introspection. Collective introspection arises from the decay of certainty, which in the United States can be traced to the 1948 publication of Walter Taylor's *A Study of Archaeology* (Taylor 1964). Since that time, our leading theorists have proffered framework after framework to interpret the past, while some now conclude that value-neutral interpretation is impossible. Archaeology, the field that concerns itself with the distant past, has paradoxically been in the vanguard of the postmodern emphases on deconstruction, exposing and evaluating assumptions, and denying authority to established narratives and established narrators. We have even become subject matter for philosophers of science (for example, Embree 1989). Regardless of where this reflection leads, archaeologists of the future will no doubt consider it a hallmark of our time.

Future archaeologists will also judge whether our introspection was on the whole productive, and whether we engaged in it too little or whether we indulged too much. They may note that late in the early twenty-first century, there was a very important part of our field that contravened the trend. This is cultural resource management (CRM), at least as practiced in the United States. Every day in this field, decisions are made that affect the future of archaeology by determining what material future archaeologists will be able to study. Yet these decisions, which are often irrevocable and which any of us should be humbled to make, are routinely made by rote application of unconscious assumptions. Here is an area where self-reflection is urgently needed. Yet, while introspection was once common in CRM, in recent years it has become conspicuously rare (figure 4.1; see also Briuer and Mathers 1996: 6–7).

We seek in this essay to reverse that quiescence, to coax the discussion of archaeological significance back to a position it formerly held at the center of discourse (Briuer and Mathers 1996). In earlier work, one of us argued that the American concept of significance, as established in regulation and routinely ap-

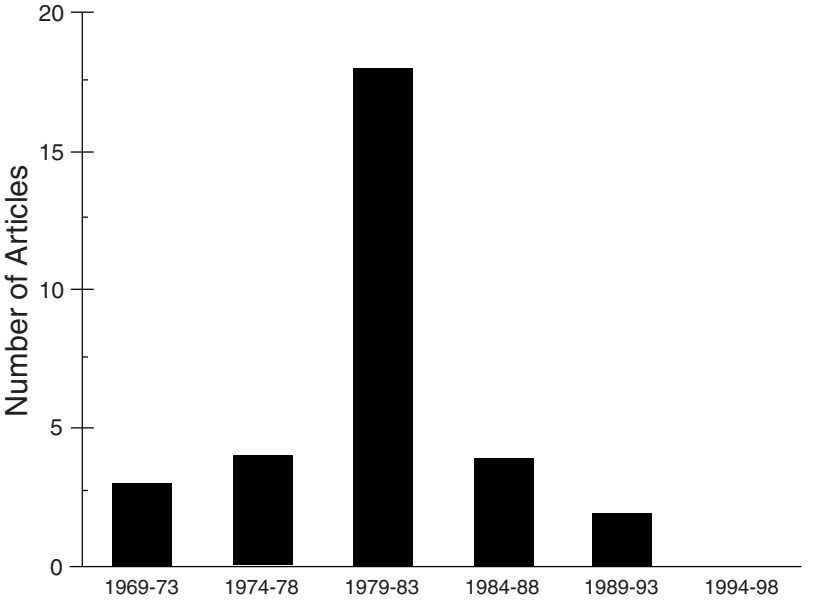


Fig. 4.1. Number of articles on how to practice cultural resource management published in *American Antiquity* between 1969 and 1998.

plied, is illogical and unworkable and does not entirely meet the purpose for which it was intended (Tainter and Lucas 1983: 715). We extend that argument here, and show how the unconscious assumptions that guide significance decisions both shape and suppress the archaeological record that we pass to the future. This has the effect of obscuring much past behavior, and of denying to entire regions and peoples the opportunity to become part of the human chronicle. In our conclusion, we suggest that the first step toward resolving this dilemma is publicly to expose and debate the assumptions underlying significance evaluations: to revive in cultural resource management the critical introspection it once displayed.

We move freely between discussions of archaeological remains that are significant to research and those that are significant to management. While the latter are not fully a reflection of the former, significance to research is one of the criteria that makes a site significant to management. The assumptions, biases, and cases that we discuss pertain to the selection of sites for both purposes.

Significance and the formation of the archaeological record

The concept of significance in American cultural resource management is as old as historic preservation itself. We have grappled with it, in one form or another, for over a century. As the federal historic preservation effort grew in the twentieth

century, it was necessary continually to refine the standards by which sites or buildings were selected for preservation. These standards were first formulated in 1934, rewritten in 1949, revised in 1956, and developed in their current form as part of the regulations implementing the National Historic Preservation Act (NHPA) of 1966 (Tainter and Lucas 1983: 707–9). The NHPA established a National Register of Historic Places to list sites significant in American history, archaeology, or architecture. To be eligible for the National Register is to merit management and protection under federal law. Sites eligible for this register are those that possess integrity and

(a) that are associated with events that have made a significant contribution to the broad patterns of our history; or
(b) that are associated with the lives of persons significant in our past; or
(c) that embody the distinctive characteristics of a type, period, or method of construction, or that represent the work of a master, or that possess high artistic value, or that represent a significant and distinguishable entity whose components may lack individual distinction; or
(d) that have yielded, or may be likely to yield, information important in prehistory or history. (Title 36, Code of Federal Regulations, Part 60.4)

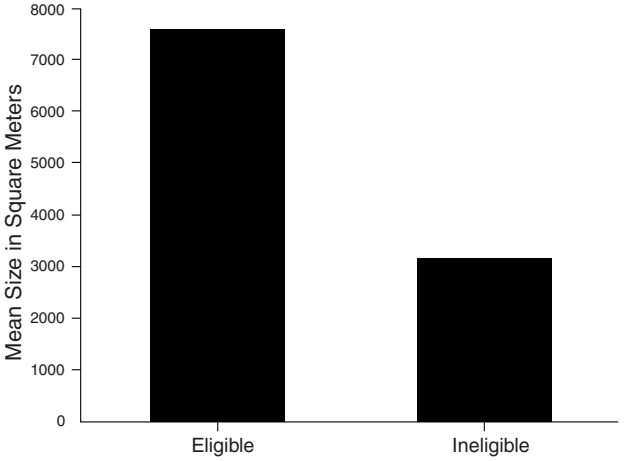
Archaeological sites have generally been evaluated under criterion d, and it is this consideration that we address.

The critical point in cultural resource management comes when one must evaluate significance, and from the results of this evaluation, recommend or decide whether a site should be preserved, studied in the face of impending destruction, allowed to be destroyed without study, or simply ignored. While some authors have taken care to recommend that evaluation should be a rigorous, thoughtful exercise (King et al. 1977: 231; Tainter and Lucas 1983: 716), the unexamined assumptions of cultural resource managers mean that many evaluations are, for practical purposes, preordained. As a result, large segments of the archaeological record are routinely judged to be forever unimportant.

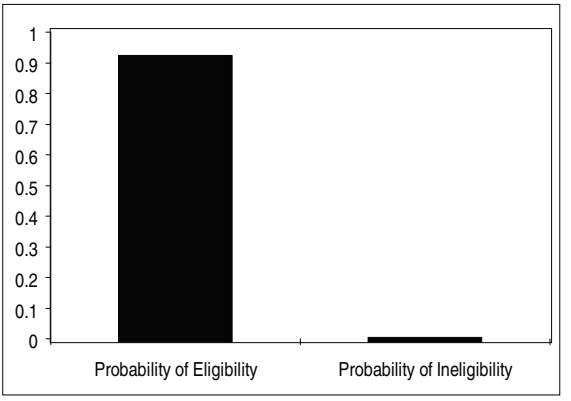
Cultural resource management, at least in the United States, is guided by what has been called the "National Geographic" approach to preservation (Tainter 1998). This is the notion that importance or significance is most evident in sites that are superlative (those that are exceptionally large, or deep, or old, or possessed of a rich material assemblage), the kind of site that is featured in *National Geographic* magazine. It is unsurprising that many of us should hold this view, for it is implicit in the way that students are taught and professionals trained. When children are introduced to archaeology, it is through accounts of the exploration of sites such as Troy or Tutankhamen's tomb. At an early age, we are taught to equate archaeology with the discovery and examination of such places. Even at the university level, students in the early stages of training are taught by accounts of the excavation of especially conspicuous sites.

Any reading of cultural resource management reports written in the United

States quickly discloses the results of this training: The larger, deeper, older, or richer a site, the more likely it will be considered worthy of study or preservation. Conversely, the shallower, smaller, or more materially impoverished a site, the less likely it is that American archaeologists will give it further consideration (figure 4.2. Tainter 1979, 1983, 1998; Tainter and Plog 1994: 169). Put another way, the overriding but understated criterion for determining the value of a site in American cultural resource management is its degree of "salience." Artifacts, as every archaeologist knows, occur ubiquitously (Ebert 1992), to such an extent



4.2a. Mean sizes of sites or components determined to be eligible (*N* = 8,929) or ineligible (*N* = 842) for the National Register. The mean size of all sites is 5,312 square meters (*N* = 31,379).



4.2b. The presence of residential or religious structures produces a probability of eligibility of 0.921 (*N* = 5,815) and a probability of ineligibility of 0.015 (N = 92).

Fig. 4.2. Implicit criteria for National Register evaluation of archaeological sites in northern New Mexico. The charts are based on all Anasazi sites from the period A.D. 400 to 1600 in the data files of the Archaeological Records Management Section, New Mexico Historic Preservation Division (*N* = 35,931). Data provided courtesy of Scott Geister and Timothy Seaman.

that they are commonly seen as background noise. Salient sites are those that stand out most clearly from their backgrounds. Obvious examples include mounds, tells, barrows, the large pueblos of the Southwestern United States, and sites with deep, stratified deposits. Sites that are well known, either within the profession or to the public, are always salient (for example, Fagan 1997). Of course, it is common to human perception that we respond to such clear signals amid an otherwise disordered world. Unfortunately, American cultural resource managers have given little thought to the implications of this perceptual bias.

The archaeological record is a continuum of patterns, from those that are highly salient to those that are ephemeral and apparently unstructured (Plog 1983; Tainter and Plog 1994). The latter may consist of only light scatters of broken, undiagnostic artifacts, such as plain-ware pottery or stone tool manufacturing debris. Superficially, they often show little content, structure, or analytical redundancy. Although in many areas such remains constitute the majority of the archaeological record (Plog et al. 1978), students learn early on to characterize them with dismissive phrases such as "just a lithic scatter."

Salient sites, for obvious reasons, gladden the heart of any archaeologist. They provide the material to fill both museum displays and data tables. What they may not do is give us an accurate or representative glimpse of the past. Consider the case of the American Southwest. In the northern part of this area, the most salient sites are pueblos: structural sites that in late prehistory contained as many as 2,000 to 3,000 rooms. Southwestern prehistory is typically written as the development and abandonment of such sites, both individually and regionally. One question rarely asked is, "How well do such sites reflect the prehistory of the area?" The answer, even more rarely given, is, "perhaps not very well." In one study in northwestern New Mexico, 95 percent of the archaeological record was found to consist of occurrences so ephemeral that by a common definition they would not even be recorded as sites (Plog et al. 1978). Clearly one must wonder how well we have written prehistory relying on an unrepresentative sample of 5 percent or less of the archaeological record.

Alan Sullivan has investigated small sites in the area of the Grand Canyon in northern Arizona, and his results illustrate the problem (Sullivan 1996). The sites he studies are light surface manifestations, few of which would be considered significant by most cultural resource managers. Yet what he found in them should greatly change our comprehension of regional prehistory. The conventional wisdom in Southwestern archaeology is that from A.D. 500 onward, populations depended substantially on maize agriculture, just as Puebloans did in the historic period. It seems reasonable to think so, for maize is commonly found in Puebloan sites and figures prominently today in ritual life. Yet, in the sites that Sullivan (1996: 154) investigated, maize is barely represented in the pollen profiles. The dominant pollen types are of undomesticated plants, which were processed at these locations.

Here we have a very different picture of ancient Puebloan subsistence, one in

which maize does not appear to have played a dominant role. It is a sobering check on one of the foundation assumptions of Southwestern archaeology, and it suggests that this part of our reconstruction of prehistory may be incorrect. If it is incorrect, this is purely a function of perceptual bias: our tendency disproportionately to investigate salient sites. Sullivan (1996: 154) points out the subtle nature of this bias: Pueblos are places where food was consumed, whereas the ephemeral sites he has studied are places where food was produced. The two kinds of site yield a different picture of the economic basis of Puebloan life, each of which by itself is incomplete.

Sullivan's work has profound implications for cultural resource management. Most cultural resource managers would treat ephemeral sites of this kind as quite unworthy of study or preservation (Tainter 1979, 1998; Tainter and Plog 1994: 169). Some would consider them not worth enough recognition even to record as a site (Tainter 1983). If the cumulative effect of such decisions is to skew the database preserved for future archaeological study, then such potential errors as the one Sullivan has exposed may be rendered uncorrectable.

The underlying problem is that significance assessments are based on the wrong criteria. That is, they are based upon material content, rather than upon the behavior that produced the content (figure 4.2). The goal of archaeology is to understand past behavior, but, as we now know well, behavior does not translate in any simple or direct manner into the formation of the archaeological record. The assumption of most cultural resource managers is that less-salient archaeological remains, the kind usually considered insignificant, must reflect less-interesting past behavior. Such an assumption has never been explicated or discussed in published literature, and it is easy to show it to be naive. Consider the matter in terms of frequency of behavior or processes. The formation of a salient archaeological record is a low-frequency process. Rome, as it is said, wasn't built in a day. Neither, for that matter, were Southwestern pueblos; they were built, used, and abandoned on timescales ranging from perhaps a generation to over a century. The formation of a tell or a deep, stratified site takes centuries to millennia. It is precisely the record of these low-frequency processes that most cultural resource managers value and seek to protect.

The high-frequency business of making a living from day to day by foraging or farming on a landscape is not fully represented in salient, low-frequency sites, as Sullivan's work so clearly shows. If we wish to understand the economic basis of ancient subsistence societies, we clearly must study this record of high-frequency behavior, and conserve it for future studies. Yet here we confront a fact that contravenes the assumptions underlying much of cultural resource management. Simply put, high-frequency land use among subsistence producers seems often to generate a minimal archaeological record. Two examples illustrate this point.

The first example is Lewis Binford's (1976) study of Nunamiut Eskimo foraging, a study which conveyed lessons for cultural resource management that have regrettably escaped notice. In April 1971, Binford accompanied Nunamiut hunt-

ers on forty-seven trips from their village, recording for each trip what items the hunter left and returned with. The difference between the outgoing and returned inventories is the potential archaeological record of the hunters' activities. Of 647 items taken on these forty-seven trips, only 53 were not returned to the village. Thus, the archaeological record generated during these excursions amounts to little more than one item per trip.

An archaeologist studying past land use would want knowledge of the hunters' behavior and of locations where activities took place. Such things are essential to understanding past cultural landscapes. A manager preserving data for future research would presumably wish to ensure that future scholars could study the Nunamiut cultural landscape. Yet the archaeological record generated by Nunamiut hunters would be dismissed by most American archaeologists as "isolated finds." These items would not normally be entered into databases or considered worthy of further notice. Archaeologists of the future would be denied the chance to study this aspect of high-frequency land use.

A second example is David Thomas's (1971, 1972, 1973) study of Shoshonean subsistence and land use in the Great Basin of western North America. This is another classic study, published in the early 1970s, and still to this day one of the best archaeological analyses of a cultural landscape. It, too, has implications for resource management that have never been recognized.

Thomas set out to test whether Julian Steward's (1938) account of historic subsistence and land use was valid for the prehistoric period. The Shoshone maintained winter villages, which along with dry caves are the most salient part of the Great Basin archaeological record. Yet they are only part of that record. The Shoshone used a variety of plants and animals distributed from lower elevation valleys to the highest mountain peaks. The artifacts deposited across the landscape compose the archaeological record from which to interpret Shoshone land use. Thomas developed a computer simulation of subsistence activities to model the archaeological record that would result from Shoshone land use as Steward described it. The data he collected to test the model included the full spectrum of archaeological remains, down to individual, isolated artifacts. He was able to confirm Steward's description and to delineate the prehistoric cultural landscape only because he considered the full archaeological record, including indications of both low- and high-frequency behavior.

We see in the Nunamiut and Shoshone cases an inverse relationship between high-frequency land use and the formation of a salient archaeological record. This relationship may apply to other types of economies and to the historic period as well. Consider the following description by John Mason Peck, a Baptist missionary who worked on the Missouri frontier in 1818:

> About nine o'clock I found the family to which I was directed. . . . The single log cabin, of the most primitive structure, was situated at some distance in the cornfield. In and around it were the patriarchal head and his

> wife, two married daughters and their husbands, with three or four little children, and a son and daughter grown up. . . . There was evidence of backwardness, or some other propensity, attending all the domestic arrangements. . . . *Not a table, chair, or any article of furniture could be seen.* (quoted in Hofstadter 1963: 76–77; emphasis added)

The entire material assemblage of these eleven or twelve people apparently consisted of farm and kitchen utensils, bedding, and a change of clothing or two (Hofstadter 1963: 77).

For European heritage management, consider the problem of identifying archaeologically the poorest classes of peasantry, whether those of antiquity or of the Middle Ages. Regional surveys done over the past two decades have given us remarkable views of rural settlement over time. Yet Peter Garnsey and Richard Saller (1987: 76) rightly caution that even the smallest sites encountered in such surveys exceed what one would expect of a peasant's residence (but see Alcock 1993: 53). Karen Carr (1992) has analyzed settlement data collected by Michel Ponsich in the Guadalquivir Valley of southeastern Spain. She suggests that the most ephemeral sites in Ponsich's hierarchy of site types (termed shelters) may in fact represent peasant houses. Yet such sites compose only 5 percent of the total number of sites dating to the fourth century A.D. (Carr 1992: 170, 214). If the social hierarchy was pyramidal, as most roughly are, the most ephemeral sites should be the most numerous. The fact that they are not suggests that if these sites were occupied by peasants, they were among the more prosperous peasants. The bulk of the farming population must have generated an archaeological record so minimal that we have either not detected or not recognized it. Thus, for European as for American archaeologists, the high-frequency processes of creating and employing a cultural landscape produce an archaeological record that can be difficult to discern.

These cases suggest a broader point. With some obvious exceptions, such as when lithic debris or broken pottery is deposited or when people live in an aggregated community, people throughout most of human existence have had little capacity to generate a salient archaeological record. Prior to the industrial era, most people simply did not produce, possess, or deposit enough durable material culture to do so. This disarming fact has far-reaching implications. It is, for example, part of the reason for the enduring importance of burials. The most salient archaeological record many people are able to generate is their own corpse. It is no coincidence that archaeologists studying so-called dark ages, such as post-Mycenaean Greece or post-Roman Europe, have tended disproportionately to concentrate on burials, for often those are the only archaeological record that they can find (Tainter 1998, 1999). The capacity to form a salient archaeological record is unrepresentative of much of the human experience. To focus as we do so predominantly on salient remains is thus to disenfranchise much of humanity. We deprive such people as hunter-gatherers, subsistence agriculturists, and the

materially impoverished of any period of the opportunity to have their experiences entered in the narrative of human history. Conversely, to include nonsalient remains in our investigations of the past, and in our lists of significant sites, would be to democratize the past.

It is ironic to point out the contrast between archaeological practice and the experience of historians of the ancient and medieval worlds. Their data consist substantially of records of low-frequency processes such as successions, sieges, wars, invasions, and edicts. They constantly bemoan their lack of high-frequency data (for example, Garnsey and Saller 1987: 75). The records of common persons that they do come upon are eagerly analyzed (for example, Millar 1977: 465–549; Laurence 1994). Surely, they would be astonished to observe cultural resource managers who, blessed with an abundance of such data, casually toss them away.

Significance evaluations: Privileging narratives of the past

Although many archaeologists long ago abandoned efforts to model prehistoric societies by the evolutionary typologies of Elman Service (1962) or Morton Fried (1967; Tainter 1978), the principles of evolutionism remain implicit in our thinking. The nineteenth century belief in progress, although shaken in the twentieth century, continues to dominate American popular culture. At a very young age, we are socialized to think that societies evolve inevitably toward the Euro-American political and economic institutions of today. Where this fails to happen, our government formulates foreign policies to help the process along. We treat the cases where evolution to greater complexity is punctuated by collapse as aberrations and catastrophes that do not negate the trend (Tainter 1988, 1999). In 1914, European powers and their offshoots controlled fully 84 percent of the earth's surface (Parker 1988: 5), and their undoubted military prowess (Tainter 1992) cemented the evolutionary presumptions.

This view was of course employed to justify conquest, colonialism, and annexation. Ann Stahl (1999) has brilliantly critiqued the influence of this progressivist stance on African archaeology and history. Her analysis enhances our understanding of cultural resource management in not only Africa but also the United States and, indeed, large parts of the world. In Africa, colonial-era studies helped to legitimize occupation by arguing (most blatantly in the case of Great Zimbabwe) that such developments as complexity and urbanism did not have an African origin, but arrived late under outside influence. With independence, the narrative changed. It became important to demonstrate that Africans, too, participated in the broader story of cultural evolution, and independently developed the same institutions for which Europeans pride themselves. In this effort, though, postcolonial scholars unwittingly adopted the Western notions of evolution and progress. Africa was not peripheral to history; its history parallels that of places more commonly described in evolutionary narratives. Indeed, in Octo-

ber 1999, Albuquerque's public television station broadcast a series under the title *Wonders of the African World*. Harvard literary critic Henry Louis Gates Jr. traveled to East, West, and South Africa, showing in each area that the cultural ideals privileged in the European progressivist narrative (such as urbanism, trade, and other aspects of complexity) were also developed independently in Africa (Gates 1999).

Stahl (1999: 43–46) shows the influence of this narrative on the development of African archaeology. Alongside the perennial questions of human antiquity, the primary emphases of African archaeology came to concern complexity. Cities and civilizations have been high on the agenda. Primacy is given to trade, towns, and empires. Iron Age studies have blossomed. Within this narrative, as Stahl notes, "so-called acephalous societies [are] important only insofar as they represent precursors of more complex forms" (Stahl 1999: 44). All this effort denies the legitimacy of the colonial narrative while unconsciously adopting its tenets.

The progressivist narrative biases the record that Africanist archaeologists perceive as significant. Sites selected for study are those that exemplify the evolutionary account. Great emphasis is placed on the most salient sites, those associated with complexity. Large Iron Age sites are good, as are sites that evidence trade, iron-working, or craft specialization. Cities are the best of all. Yet much evidence of other behavior is suppressed. The history of simple communities has been marginalized. Attention has been diverted from other potential questions, such as relationships between sites supposedly representing different evolutionary stages and the nature of subsistence in the Iron Age (Stahl 1999: 44). Ultimately, this approach has affected cultural resource management throughout Africa. Agencies such as UNESCO have issued site-significance criteria that attempt to universalize African history. Significant problems are defined on the basis of a progressivist, evolutionary model. Funding is attuned to the last two millennia and to evolutionary developments. Needless to say, the most salient sites are accorded the greatest privilege. As in the United States, the *National Geographic* approach dominates cultural resource management. Stahl (1999: 39, 42, 44–46) refers to the entire process as "winnowing variability."

There are clear lessons in the African experience for American cultural resource management, for in many ways we show similar biases: progressivist, if no longer colonial. Our parks and monuments presenting archaeology always feature the most salient sites. In the Southwest, as noted, we place high priority on understanding the development of the pueblos. Schemes for the evaluation and management of Southwestern sites routinely privilege this evolutionary narrative (for example, Green and Plog 1983; Upham 1988). In so doing, we limit our ability to perceive variability and to generate narratives of other patterns of behavior (for example, Upham 1984). The archaeological record of peoples practicing nonsedentary land use is usually distanced in time, and treated as precursors to, rather than contemporaries of, the Pueblo people (see Stahl 1999: 46). Thus, Southwestern archaeologists remain unable to unravel many questions of

the early Athabascan occupation in the Southwest. Many suspect the primary reason is that we distance the kinds of sites early Athabascans may have produced, ephemeral lithic scatters, to what we think is their proper place in an evolutionary narrative. While we probably do encounter early Athabascan sites, we would typically label them Archaic. Similar problems could be enumerated for other areas where more complex societies and salient sites developed late in prehistory. In the Midwest and Southeast, the evolutionary narrative emphasizes earthworks and exotic artifacts of the Middle Woodland and Mississippian periods. In studying settlement patterns, researchers concern themselves more with vertical relationships among sites than with horizontal ones (Blitz 1999: 579). The possibility of a Late Woodland (ca. A.D. 400–900) collapse in this sequence is often denied.

One consequence is that there are curious lacunae in the archaeological map of North America. For example, the vast area of southeastern Colorado and adjacent states, tens of thousands of square kilometers of land, is largely ignored and nearly unknown archaeologically (for example, Johnson et al. 1989: 1; Anderson 1989: 8). The archaeological record of the area clearly displays a long and varied occupation from Folsom to historic times, yet the region figures minimally in syntheses of Plains prehistory. There is evidence of long-term persistence in what is often considered a marginal area (Bagley 1999). To the extent to which the late prehistory is known, it is from the most salient sites: from the stone structures of the Antelope Creek Focus in the Texas Panhandle and of the Apishapa Focus in Colorado, and from occasional cave sites (Gunnerson 1987: 87–90). Yet fieldwork by the authors in the Piñon Canyon area of the Purgatoire River and by Bagley (1999) in the Picture Canyon area reveals that these sites are a limited part of the regional archaeological record. That record consists substantially of chipped stone tools, quarries, and debris spread across much of the landscape, but concentrating in settings of high topographic diversity such as canyons.

This is a rich and extensive archaeological record, which Bagley (1999), borrowing from Max Evans (1962), has dubbed "Hi-Lo" archaeology: high site densities but low site profiles. Across the region, nonsalient remains constitute most of the evidence of past land use, yet they figure little in either cultural resource management or regional prehistory. Management concentrates on highly visible caves, rock art, areas of land-use impacts, and historic sites such as the Santa Fe Trail. Research focuses on caves, rock art, and stone structures. Within this focus, many questions can never be answered: the relationship of salient to nonsalient sites; subsistence, seasonality, and high frequency land use; adaptive change; regional population levels and distribution; the Apachean occupation; and many others. The region also cannot fulfill its potential to contribute to a broader understanding of how foragers and subsistence agriculturists have used so-called marginal landscapes (Bagley 1999). We are constrained instead to the segments of prehistory that can be learned from a minority of sites or from

those that need immediate management. It is those sites that we will most emphasize in managing for the future. In this and other areas, we not only winnow variability, we suppress it.

Significance and the production of the archaeological record

The concept of significance stems from the Western philosophical tradition known as empiricism in England or as positivism on the Continent (Tainter and Lucas 1983: 711–12). Proponents of this tradition assert that we know things by experiencing them, so that the path to knowledge is to perceive sensory experiences without preconceptions. In this view, scientists observe and record for the future an undistorted description of their subject matter. The influence of this philosophical view on archaeology and cultural resource management leads to the supposition that the archaeological record is something that we perceive, record, and evaluate for the future based on objective criteria.

It is clear from the discussion here that this view is disquietingly naive. Cultural resource managers do not merely perceive, record, and evaluate the archaeological record. To the contrary, they apply a set of mostly unexamined assumptions, biases, and filters to privilege certain parts of the record, and to suppress the rest. Through this filtering, entire categories of archaeological remains (and the behaviors by which they were produced), and even entire regions, are denied the opportunity to be recorded in databases, to be passed to the future, or to enter the corpus of humanity's knowledge of itself.

In this sense, the archaeological record is not the mere accumulation of our passive observations. Given the numerical and fiscal dominance of cultural resource management in American archaeology, what cultural resource managers choose to recognize, record, and manage *becomes* the archaeological record. Cultural resource managers do not so much *discover* the archaeological record as, unconsciously but actively, they *shape* and *produce* it. The archaeological record is an active construct of our assumptions and biases. Although cultural resource management was established to preserve for the future as much of the archaeological record as possible (Lipe 1974; Glassow 1977), what we actually pass to the future, without caveat, is precisely these assumptions and biases and the material remains that they privilege. It is one thing to pass a distorted record to the future if, having examined our biases and filters, we are cognizant of doing so and warn the future of what we have selected. To do so in ignorance of how we privilege some parts of the record, and suppress others, is inexcusable.

Concluding remarks

The problem of archaeological significance goes beyond blind application of unquestioned assumptions. It arises from the very essence of how we comprehend our world. We comprehend and describe the world in categories: animal/

vegetable/mineral; earth/space; mind/body; human/animal; site/isolated find; significant/insignificant. To comprehend the cosmos, it is of course necessary to employ categories to reduce and bring order to the vastness about us. Cognition, and retention of information, is unthinkable without categorization.

We learn to think this way as infants, and in so doing absorb categorization into our cognition so fundamentally that few of us realize that this is how we think, let alone question it. We assume unconsciously that, since we perceive our world in categories, that is how it occurs. This is natural and mostly unremarkable. Categorical thinking is necessary, but it can also be insidious. It works its worst when we are unaware of it. This is clearly illustrated in the matter at hand: Most American practitioners of cultural resource management are now socialized to believe that archaeological sites in a management context occur in two varieties: significant and insignificant. This categorization is intrinsic to our thinking and our work. As we have seen, it leads us actually to suppress much of the archaeological record, and thus many dimensions of past behavior. We are reminded of Christopher Hitchens' (1988: 301) remarks on such reasoning: "The best that can be said for this method [categorical thinking] is that it economizes on thought. You simply unveil it like a Medusa's head and turn all discussion into stone." Our unconscious categorization, and our transmission of this categorization to new archaeologists, sets in stone an approach that contravenes the principle on which cultural resource management was established: conservation for the future.

The first step toward resolving a dilemma arising from unconscious assumptions is to expose them. It is time for the profession publicly to debate how we value nonsalient sites, the past behaviors from which they originated, and the losses that we incur when we routinely dismiss them. This is no more than to call for a return to an earlier phase in our literature. The early period of cultural resource management in the United States produced a substantial reflexive literature. Throughout the 1970s and into the early 1980s, theorists explored and argued about the best ways to practice this emerging field (for example, King 1971; Lipe 1974; Glassow 1977; King et al. 1977; McMillan et al. 1977; Schiffer and Gumerman 1977; Moratto and Kelly 1978; Raab and Klinger 1977; Sharrock and Grayson 1979; Tainter 1979, 1983; Lynott 1980; Tainter and Lucas 1983). Since those heady days, these reflexive expressions, with very few exceptions (for example, Leone and Potter 1992), have precipitously disappeared (figure 4.1). No longer does our literature feature very many discussions on the relationship of archaeological variety to preservation requirements, on conflicts between land uses, on evaluating significance or importance, on the role of bias in preservation decisions, or on the role of heritage management in contemporary society. Instead, cultural resource management has evolved into a technical field in which important and irrevocable decisions are made on the basis of prescribed regulations applied without critical thought. It is urgent that our earlier introspection be revived, for in its absence we witness daily the destruction of part of

our heritage, which archaeologists will someday regret. Perhaps this book signals a renaissance in critical thinking about heritage management. It may, but only if we take up our pens and continue the effort begun here.

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II

Archaeology in context

5

Archaeological significance and the governance of identity in cultural heritage management

Laurajane Smith

Introduction

Archaeological significance is a useful starting point when considering the consequences that cultural heritage management (CHM) has for both archaeologists and others who have an interest in the past and its material culture. Significance is a central concept in CHM, as it is those things that we regard as having value, or as being "significant," that we actively protect, manage, and conserve. It is thus those measures used to define what is significant that will define and shape the nature and meaning of the sample of material culture that is saved for the future. For archaeologists, the significance of material culture often lies in its usefulness or lack of usefulness as data for research. For many other groups, material culture provides the physical resources, linked to history and the past, which are drawn on in an active process to create, recreate, or maintain cultural and social identities.

The different values and meanings attributed to material culture may, and often do, come into conflict with each other within the CHM process. It is not, however, this conflict that makes CHM political, but the fact that different groups bring to any conflict varying resources of power to give legitimacy to the values and meanings they hold to be significant. Archaeological significance assessments have become integral to the CHM process and, as such, provide an interesting link between archaeological science and expertise and the politics of cultural identity.

In this chapter, I use Australian Aboriginal CHM as a case study to examine the way archaeological discourse on "significance" has become a resource of power in CHM. The point I wish to make here is that, as Purvis and Hunt (1993) argue, discourse may have an ideological content. A distinction can be made between an unproblematic discourse on science and method and a scientific discourse, which

is intertwined with ideology. The ideological content of the discourse on archaeological significance revolves around processual values and assumptions about the value-free nature of science, allowing political problems and conflicts over the meaning of the past to be rendered merely technical issues of management.

The degree to which processual values and assumptions are embedded and naturalized in the discourse on archaeological significance in Australian Aboriginal CHM has had a number of consequences. Not least is the ability of archaeological significance discourse to depoliticize the values and meaning Aboriginal people place on material culture so that Aboriginal cultural politics becomes tractable and more governable by policy makers. To make sense of the impact that the archaeological discourse on significance has on cultural politics, I draw on the idea of governmentality, which offers a useful way of understanding how expert knowledge may be mobilized in ways not intended by experts to govern and regulate social and political problems.

Archaeological significance as processual ideology

CHM in Australia is a relatively recent phenomenon; it was not until the late 1960s or the 1970s that most Australian states developed public policy and enacted heritage acts to deal with the conservation of what was defined in the legislation, until recent amendments in some states, as "Aboriginal relics."

By the late 1960s and 1970s, public concern over the destruction of cultural heritage had become a notable issue (Flood 1989; Mundey 1988). Also at this time, Aboriginal activism had become increasingly assertive, following the unequivocal granting of Australian citizenship to Aboriginal people in 1967. From the late 1960s, Aboriginal activists were using claims to past material culture and identity to reinforce demands for land. Thus, by the late 1960s and early 1970s, a significant social problem existed regarding the management and use of Aboriginal material culture.

During this period, archaeologists had also been lobbying governments for legislation to protect what they defined as "archaeological sites and Aboriginal relics" (for instance, Mulvaney 1964, 1970; Megaw 1966; McCarthy 1970; McKinlay 1973; Edwards 1975). Lobbying was successful in that in almost all states, heritage legislation was written either by or in close consultation with archaeologists, and archaeologists found jobs administering policy and legislation in state heritage agencies (Sullivan 1983; Smith, forthcoming).

What is of interest here are the reasons archaeologists gave as to why they were concerned with the development of heritage legislation. Archaeologists, writing in both Australia and the United States, where CHM was also undergoing rapid redevelopment in the 1960s and 1970s, emphasized the need to prevent the looting of sites by nonarchaeologists (see, for example, Mulvaney 1990: 249f; also McGimsey 1972; Deetz 1977; Arnold 1978; Cockrell 1980; Fowler 1982). This concern reached a climax in a period when there was also general public

concern about the fate of cultural resources in the face of increasing development. Archaeologists were at this time concerned with ensuring that scientific values were legally recognized and differentiated from public perceptions about the value of heritage objects.

As part of their lobbying, archaeologists were asserting for themselves a newly aggressive identity as "professional objective scientists." In Australia, this assertion was underlined by the importation in the late 1960s and early 1970s of processual theory from the United States and the arrival of so-called "professional" or university-trained archaeologists from the United Kingdom. Processual theory successfully advocated that the discipline epistemologically remodel itself on the natural sciences. Logical positivism was forcefully advocated as the correct philosophical position for archaeologists to adopt. The professed aim of the "New Archaeology" was to develop universal laws. Archaeological science claimed stewardship over the past, particularly Indigenous pasts, through its ability to universalize that past and make it relevant to all "mankind." See Smith (forthcoming) for an elaboration of this argument.

Early Australian debates on the nature of archaeological significance and how it should be used in CHM drew heavily on literature from the United States, where similar debates were occurring. Bowdler (1981: 131), for instance, argued for the need to use research designs, stressed in the U.S. processual literature, when assessing the significance of sites to "raise the standard of contract archaeology," and to ensure site management was "carried out according to the most vigorous scientific principles." However, she also recognized that research values attributed to sites and places could change (Bowdler 1981, 1984). She argued that as archaeological research develops, what we perceive to be important archaeologically will change as new research questions are developed and explored (Bowdler 1984: 7). To preserve only those sites of value to archaeologists in the present would stifle the development of important research questions in the future.

Thus, two broad criteria for the measurement of archaeological significance were proposed: research "significance" and "representativeness" (Bowdler 1981: 0 129, 1984: 1; Bickford and Sullivan 1984; Pearson 1984). Both of these concepts were drawn directly from the U.S. literature on CHM, or cultural resource management (CRM).

Much of the American CHM debate can be shown to reflect the theoretical concerns of the New Archaeology. One of the major debates in the 1970s in the U.S. management literature revolved around the need to develop clear research designs, which would provide frameworks for the assessment of scientific or research significance. It was agrued that the preservation of sites that could be explicitly linked to research questions would provide a more meaningful database than sites preserved for vague or and unspecified reasons (King 1971, 1977; Gumerman 1977; Goodyear et al. 1978; Raab and Klinger 1977, 1979; Lynott 1980; Fowler 1982). This debate was framed by the New Archaeology's concern with deductive research as opposed to the inductive research base of earlier ar-

chaeology (King 1977; Gumerman 1977). Further, research criteria provided a more acceptable scientific basis for significance assessments, as it helped to distinguish archaeologists in the public perception from treasure hunters and unscientific amateurs. The scientific value of sites was emphasized in several popular books published in the 1970s to educate the public about the values of the archaeological resource (see, for example, McGimsey 1972; McGimsey and Davis 1977; Deetz 1977; Fowler 1977).

In addition, acceptable scientific criteria and assessment were stressed in relation to American Indian protests of the use of their sites by archaeologists. In the American literature (for example, Meighan 1992; Bonnichsen 1999; Owsley 1999; Landau and Steele 2000), as in the Australian (Mulvaney 1981, 1991; Allen 1983, 1987; Murray and Allen 1995), it is often the unquestioned value and authority of scientific research and knowledge that archaeologists cite in defense of their access to Indigenous human remains, places, and artifacts.

Numerous archaeologists, writing in the 1970s and early 1980s, coupled their concern with providing a scientific basis for site assessment with the assertion that a "crisis" was upon archaeology (for example, Mulvaney 1970; Clewlow et al. 1971; King 1971; McGimsey 1972; Coutts 1977; McGimsey and Davis 1977; Lowenthal 1981). Their alarm was triggered by the increasing destruction of archaeological sites and places by development or by the uncontrolled collection of sites by amateurs. By stressing the scientific and objective nature of archaeological research and site assessments and by a discourse that identifies and discusses archaeological resources, this literature maps out the legitimacy of archaeological access and control over material culture (for example, McGimsey 1972; McGimsey and Davis 1977).

Material culture has a physical existence, and its social construction as "archaeological sites," "archaeological data," or as part of the "archaeological record" has direct political consequences. The positivism and empiricism of processual theory often assumes that objects from the past are inherently archaeological in that they are data or part of an objective "archaeological record." The positivist epistemology of processualism conflates the signifier with the signified; thus, by adopting this epistemology, archaeologists, with an authority conferred on them by their professional and intellectual status, put forth a view that the objects are the label rather than that which is described by the label. The idea that meaning is inherently fixed in an object and that we must have a research question that will make a priori sense of that meaning denies that sites can have meaning, and thus value, outside of a scientific framework (Tainter and Lucus 1983; Hill 1992: 810).

The New Archaeology, by advocating and providing a rigorous and systematic theory and methodology, was responding to several political needs. It was in effect ensuring the priority of archaeological access to sites (the database) over access by the public and Indigenous peoples via the authority invoked by the use of archaeological language and scientific ideologies. As Dunnell (1984: 64) ironi-

cally notes, the U.S. heritage legislation developed at this time protects sites and places on public land from everyone "other than archaeologists." This is reflected in the Australian situation, where archaeologists are often the ones in the position to control the administration of legislation. This situation is interesting when we note the fundamental paradox underlying the archaeological *conservation ethic*. Given that much of archaeological research, or research as it was traditionally viewed in the 1970s and 1980s, is destructive, the ideal of archaeological conservation becomes problematic.

The use of research designs in assessing significance, advocated by many New Archaeologists in the 1970s, came under criticism with the realization that just because a site might not fit a current research problem, that did not mean it was not significant either to archaeology or to other interested parties (Sharrock and Grayson 1979; Barnes et al. 1980). Other archaeologists felt that research designs developed their own bias, and that it was only certain research problems that would be considered to be important enough in assessing sites (Dixon 1977; Dunnell 1984: 71). To deal with these issues, many Australian and U.S. writers (most notably Lipe 1974, 1977; Dixon 1977; Glassow 1977; Bowdler 1984; Pearson 1984) advocated the notion of representativeness. They argued that representativeness, as a significance criterion, ensured that both rare sites and good examples of common types would be preserved for future reference.

As with the idea of research value, one of the assumptions underlying the idea of representativeness is that a site or place will have inherent qualities that make it either unique or common (Tainter and Lucus 1983; Smith 1994). Australian studies that have attempted to identify the representative attributes of various site types have failed (see, for example, Smith 1989, 1991; Hiscock and Mitchell 1993). These studies argued that it was not possible to identify representative criteria that were not influenced by the values held or research questions posed by the researchers. Although the concept of representativeness does not solve the problem it was designed to solve, it is still implemented as a way of ensuring that a range of sites and places reflecting nonarchaeological values are protected (see chapters in Dunnett and Feary 1994).

The problem here is that the concept of representativeness in the U.S. and Australian literature has diverted critical archaeological attention from the long-term implications of the observation that values change between time and place, and from the idea that values held by other groups may be fundamentally different from those held by archaeologists.

The consequences of archaeological significance criteria

The privileging of archaeologists and their values in CHM occurred as a result of the authority conveyed by their claims to scientific expertise and rationality embedded in archaeological significance criteria. The development of CHM came at a time when the New Archaeology was actively redefining archaeology and em-

phasizing the scientific aspects of the discipline. CHM provided a vehicle to publicly reinforce these claims and presented archaeology with a means not only to protect their database but also to institutionally distance themselves from claims that they were treasure hunters and grave robbers. This was particularly important in Australia because Aboriginal people were explicitly using such negative imagery when criticizing Australian archaeology.

As embodied by archaeological values in CHM, processual theory became a significant resource of power utilized by archaeologists and heritage agencies. For archaeologists, the immediate consequences of exercising this resource of power were access to data and the assurance that data would be *preserved* for future research. However, this situation has had wider ramifications both for archaeologists and for Aboriginal people, whose material culture is the subject of management.

To understand this consequence, it is important to note that significance assessments are the keystone of the CHM process in Australia. All decisions about the management of a site or place should flow from the assessment of significance. Management must aim to maintain the values given to a site or place, and no action should be implemented that would adversely impact on heritage values. Thus, the privileging of archaeological values in the assessment process means that they also become central in defining the intellectual parameters of any debate about the meaning of the past and its material culture.

During this process, archaeological significance assessments have come to play a part in the governance of aspects of Aboriginal cultural identity. The literature on governmentality, drawing on Foucault's (1991) later work, is useful for theorizing this process. The governmentality literature argues that intellectual knowledge by "rendering the world thinkable, taming its intractable reality by subjecting it to the disciplined analyses of thought" (Rose and Miller 1992: 182) is incorporated into the act of governing populations and social problems. Importantly, this process is based on liberal modernity, which stresses rational universal truths (Rose 1993). Thus, archaeological rationality, emphasized by the logical positivism of processualism, became useful for defining populations (be they Indigenous peoples or other groups) through both their archaeological past and the material culture (or heritage objects) that was defined as representing their past. Furthermore, the application of rational knowledge explicitly renders the social problems it governs as nonpolitical and thus more tractable.

Archaeological knowledge and values became inextricably tied into the CHM process, and through CHM archaeology they became a "technology of government" (Rose and Millar 1992: 175), that is, a body of knowledge and expertise that government and bureaucracies mobilize to get things done (Dean 1994, 1999). Archaeological expertise determined the value and meaning of Aboriginal cultural heritage, and subsequently archaeological significance assessments helped to govern the legitimacy of Aboriginal claims made on the basis of links to

the past and cultural identity, while also depoliticizing these claims by redefining them as technical issues of assessment and management.

Implications and future directions in CHM

Both in the United States and in Australia, Indigenous and other interest groups have over the two last decades increasingly lobbied government heritage agencies for a more active role in the management of their heritage. One of the major implications of the observations made above is that archaeological notions of heritage value and significance, based as they are on processual science, provide little intellectual room for the inclusion of knowledge systems and values not encompassed by logical positivist frameworks. This situation, then, has the potential to increase conflict and tensions between archaeologists and Indigenous or other interest groups with a cultural or historical stake in the past. Since the 1980s in Australia, both government and freelance archaeological heritage managers have increasingly attempted to include Indigenous values in the assessment and management process. However, the disjunction between archaeological and Indigenous values, together with the authority of archaeological science, has led to an increasing sense of marginalization and an increasing frustration with both archaeologists and their research in Indigenous groups (see Ellis 1994; Greer and Henry 1996). On the other hand, where government heritage agencies have actively chosen to privilege Indigenous values over archaeological values, the result has tended to be the marginalization of archaeological interests and research values. One case in point is the celebrated conflict over the return, after legal action, of Tasmanian Aboriginal artifacts and other excavated material from La Trobe University to the Tasmanian Aboriginal community at the behest of the Tasmanian government. In this case, archaeological values were completely sidelined and a major research project jeopardized. Subsequently, the failure of archaeologists to frame arguments about the value of the collection in anything but scientistic discourse meant that it became difficult for nonarchaeological heritage policy makers to develop an inclusive resolution to the conflict. Thus, archaeological values, in this case at least, were marginalized (Smith, forthcoming).

However, an either/or situation between nonarchaeological cultural and historical values and archaeological values need not arise. For conflict resolution in CHM to be inclusive of a wider range of nonarchaeological values, archaeologists must reposition themselves in the CHM process. Rather than maintaining the position of objective experts and utilizing a discourse embedded with processual ideology, archaeologists may need to critically question their positions of power and renegotiate their position as "experts" relative to other interest groups such as indigenous peoples. In Australia, this has been done by some archaeological researchers and heritage managers, who, by identifying the network of power relations between archaeologists and Indigenous people in the

CHM process, have been able to successfully negotiate the development of research and heritage projects. These projects aim to include Indigenous interests as active players in setting project aims and parameters (see, for instance, Ross 1996; Clarke 2002; Greer et al. 2002; Smith et al. 2003). However, I am not advocating that archaeologists uncritically accept all nonarchaeological values and interests as equally valid, nor am I necessarily advocating that archaeologists abandon all claims to a central role in heritage management. What I am suggesting, however, is that archaeological managers not only recognize the political nature of CHM but, more importantly, that they identify the resources of power and privilege that archaeologists bring to any negotiation or conflict over the disposition of material culture. By recognizing and understanding archaeological resources of power, archaeological managers may be in a better position to consciously and constructively influence the outcome of heritage conflicts and management processes. In the process, archaeological knowledge may lose its privileged position in the governance of indigenous cultural claims, but the ability of CHM to maintain and regulate archaeology as a positivistic science may also, usefully, become jeopardized.

Conclusion

In Australian cultural heritage management, it is archaeological values in assessment processes that define the intellectual parameters of debate over the meaning of the past. In effect, archaeological ideas of significance and knowledge are used both to interpret Aboriginal values and meaning in terms understood by bureaucracies and to make legislative or binding statements that may be used by bureaucracies and policy makers to legitimize Aboriginal claims about cultural identity.

In this process, archaeological significance concepts and the ideology underlying them are constantly recreated and reinforced through their institutionalization by the CHM process. Furthermore, the authority given to archaeological significance and knowledge through their mobilization as a technology of government ensures archaeological access to the database and the privileging of archaeologists in CHM. Ultimately, archaeological identity and authority, as well as values, become embodied in CHM and physically reinforced by archaeological access and control of material culture. In Australia, at least, this has resulted in an inability to effectively break from the processual ideologies that underpin archaeological authority and access to data, because to do so would jeopardize that access. In this way, the archaeological significance criteria used in CHM become a means through which not only Aboriginal cultural identity is governed, but also a means by which archaeological identity as a positivistic science is itself regulated and maintained.

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6

"Rigidity and a changing order . . . disorder, degeneracy and daemonic repetition"

Fluidity of cultural values and cultural heritage management

W. E. Boyd, Maria M. Cotter, Jane Gardiner, and Gai Taylor

A start: Cultural heritage and human behavior

Human beings bring complexity to any situation: the derivatives of human behavior, cultural values and social behavior, may then be reasonably expected to have enhanced complexity. The consequential representation of these values and behavior must therefore be expected to be diverse and complex. In this discussion, these consequences are the representations of the cultural past through the medium of cultural heritage. With the emergence of multicritical analyses of society and culture, a traditional view of a single history becomes increasingly untenable and open to contest.

In recent years, the issue of a multicritical, multivocal, and connected past has been amplified in various disciplines and contexts. Tuan's observations on human nature and behavior, for example, extend, in his view, beyond the personal to social and cultural scales (Tuan 1974, 1977), hinting at multivocality and contest: "people sometimes behave like cornered and wary animals . . . [but] may also act like cool scientists . . . neither posture hold[ing] sway for long. . . . The human person . . . is animal, fantasist, and computer combined. . . ." (Tuan 1977: 5). In a more direct heritage context, Lavine and Karp's (1990) assessment of museum exhibition as the archetypal representation of cultural past emphasizes the behavioral element of exhibition. Taking the limited perspective of the creator or curator, multivocality and contest is readily apparent:

> Every museum exhibition . . . inevitably draws on the cultural assumptions and resources of the people who make it. Decisions are made to emphasize one element and to downplay others, to assert some truths and to ignore others. The assumptions underpinning these decisions vary according to

> culture and over time, place, and type of museum or exhibit. Exhibitions made today may seem obviously appropriate to some viewers precisely because those viewers share the same attitudes as the exhibition makers, and the exhibitions are cloaked in familiar presentational styles. We discover the artifice when we look at older installations or those made in other cultural contexts. The very nature of exhibiting, then, makes it a contested terrain. (Lavine and Karp 1990: 1)

As a final opening comment, we hear Vogel observing that "an exhibition on how we view African objects (both literally and metaphorically) is important because unless we realize the extent to which our vision is conditioned by our own culture, unless we realize that the image of African art we have made a place for in our world has been shaped by us as much as by Africans, we may be misled into believing we see African art for what it is" (Vogel 1988: 11). Her analysis of her Art/Artifact exhibition of African art in anthropology collections focuses on the way in which object value changes with exhibition context. Using Mijkenda memorial posts presented in various exhibition settings (for example, reproductions of traditional museum rooms, dioramas, natural history displays, and art galleries), Vogel describes how both the display-based inference of value and the viewers' interpreted values are influenced and constructed by the contextual setting of the objects. This complex of curation-setting-object-viewer results in a diversity of cultural interpretations of a common object, and hence explicit contestation of original represented and subsequent received value.

Cultural heritage can, therefore, be usefully analyzed in terms of contested terrain. This theme is becoming increasingly central in discussions of cultural values and notably of presentation or representation of past culture, and provides a conceptual basis with serious implications, which should influence the practice of cultural heritage management. Here we identify some of the symptoms of contest inherent in constructions of cultural heritage meanings. Implicit here is the notion of construction(s) of meaning(s), and thus that an appreciation of the diversity and dynamism inherent in multiple meanings provides an invaluable approach to both intellectual and practical considerations of cultural heritage and, especially, possibilities in the realignment of method in cultural heritage management. We approach this in three ways.

- First, we examine issues emerging in the broad cultural studies literature. These are issues of cultural heritage itself, the cognitive ownership of knowledge, contest, the gaze, and the text as metaphorical approaches to understanding heritage. The focus of our interest is on their application to understanding cultural heritage.
- Second, we present several case studies: observations presented as readings of cultural heritage places. These are used to illustrate the complexity and multivocality of cultural heritage, and in all cases reflect the connectedness of diversity inherent in any item of cultural heritage, espe-

cially where examined from a cognitive ownership perspective. The specific studies are largely arbitrary, arising from the authors' research interests, and are by no means taken as representative of specific classes of cultural heritage.

- Finally, we draw a larger picture of cultural process, specifically to propose a liberating process for the practice of cultural heritage management. This process emerges from consideration of the colonial/postcolonial faces of cultural heritage management, the growing acceptance of multivocality in the "tracing of play of power in social formation" and a recognition that "commodity is ideology made material" (Fiske 1989: 45, 14), and the implications these have on our perception of meanings of cultural heritage.

Cultural heritage as contested terrain

The theme of contest and contested terrain reflects, in part, growing and broad interests in the intellectual discourse of social and cultural studies, issues of identity, conflict of representation, construction of values, and the development of complex and often metaphorical models of explanation (for example, Jackson and Penrose 1993; Keith and Pile 1993; Cloke et al. 1994; Porteous 1996; Barnes and Gregory 1997; Fuery and Mansfield 1997). Much of the analysis within this literature applies to matters of cultural past and its representation. In particular, a sense of cultural heritage, as contested domain, most strongly emerges with practical examination of modes of representation, such as museums, heritage places, events and visitor centers, and historical writing, and their effectiveness in representing the cultural past (for example, Karp and Lavine 1990; Walsh 1992; Darien-Smith and Hamilton 1994; Gostin 1995; Schmidt and Patterson 1995). Contested interpretations of past culture may emerge within a culture, notably with the growth and acceptance of the popular or folk cultures, which frequently challenge, counter, and question the dominant received wisdom of traditional upper- and middle-class high cultures and the perseverance of official history. Noting that history, for example, comprises "the objective processes lived and experienced by peoples which constitute the only way to understand and explain present-day social conditions," Arena (1995: 47–48) notes that official histories ". . . mask the real causes of historical change . . . [communicating] the idea that history is a linear, chronological accumulation of events, names, and dates unrelated to everyday life . . . [and manipulating] the knowledge of history."

The force of contestation becomes most readily apparent where several cultural groups interact, often in colonial or postcolonial political and social settings. The contest is heightened where the representation of elements of one culture is dominated by another: the public administration of Australian Indigenous places, for example, is firmly set within the parameters of non-Indigenous governance (for example, Pearson and Sullivan 1995; Hall and McArthur 1996),

despite efforts to involve Indigenous people in heritage management (compare Birckhead et al. 1993; the same applies elsewhere, for example, Kerber 1994). Ultimately, and given the intellectual and political traditions of historically and colonially established behavior still influential in nominally postcolonial societies, any change becomes an issue of national and inherently contested politics. Any statement of re-representation and restructuring of cultural heritage management, which will often include the recognition of the plurality of represented values, presents an expression of what Wylie, in reviewing alternative writings of history, describes as the "struggle against various forms of dominant history and against the terms of its construction—the structures of opposition, the presuppositions about historical scholarship and authority—where these threaten to infuse and usurp the alternatives" (Wylie 1995: 258).

Notions of cultural heritage

The discussion here emerges from previous work, in which the inadequacies of what are considered to be oversimplified statements of cultural values attached to particular types of cultural heritage places (archaeological sites, Indigenous spiritual sites, historical buildings, visitor centers, and so on), appear to have led to the problematic management of these places (Boyd and Cotter 1996; Boyd et al. 1996). That work recognized that the individual cultural heritage "site," the conventional focus of administrative and legislative cultural heritage management (for example, Flood 1990; Hall and McArthur 1996; English 1994), is becoming increasingly inadequate. Cultural places have been traditionally defined in culturally, temporally, and geographically limited ways: definitions tend to be monocultural or monoethnic, to a lesser extent monotemporal, and most frequently microgeographical. In this context, several processes are assumed: (i) the cultural place is defined by reference to one cultural and often ethnic group, who claims or is attributed sole proprietary rights over the cultural capital of the place; (ii) the place is identified in terms of a static history fossilizing meaning to a few single points in time; and (iii) the place is defined by its immediate surroundings (often pragmatically expressed in land-tenure terms and physical fencing) as an individual point seemingly unrelated to its landscape contexts.

Two trends indicate that this individual-site-focused approach is increasingly inappropriate in managing cultural heritage. In archaeology, cultural landscape concepts emphasize the connectedness rather than the singularity of sites (for example, Head et al. 1994; Ross 1996) and the importance of landscape and environment in the understanding of past human behavior (for example, Butzer 1982). Second, increasing awareness and vocalization of Indigenous and other community claims to land and places (for example, Toyne and Vachon 1984; Lippman 1994; Fourmille 1996) draw attention to the complexity of interest in sites within any landscape, resulting in Indigenous and community involvement (albeit often still marginal) in site and area research and management (for ex-

ample, Birckhead et al. 1993; Kerber 1994; Layton 1994a, 1994b). Consequently, cultural heritage sites become identified within complex social and physical landscapes, and heritage managers need to be able to recognize, identify, understand, and operate within such landscapes (Cotter et al. 2001).

There are several implications of such an analysis of cultural heritage places and their management. First, the traditional monolithic approach to cultural places represents an intellectual denial of meaningful cultural, social, political, and geographic understanding of the place. Second, the practice reflects a denial of the multiplicities of meaning, the modes of construction of these meanings, and the complexities of overlapping landscapes implied by the places. Third, in practical terms, political and administrative issues of site access, use, and management become blurred by simplistic notions of meaning, which are often characterized by the uncritical and monolithic acceptance of a single and indisputably correct history, and become sidetracked into discussion and debate which is at best trivial and at worst inappropriate, unnecessary, and adversarial.

Cognitive ownership of cultural heritage

From this situation, Boyd and Cotter previously developed the idea of "cognitive ownership" (Boyd and Cotter 1996; Boyd et al. 1996), a deliberately provocative term designed to focus attention on the diversity of socially constructed values which may be identified for any cultural place. Founded on the concepts and pragmatics of social construction theory (Jackson and Penrose 1993), the term refers to the interest in or association with a cultural site claimed, even implicitly, by any person or group who attaches some value to that place. As such, cognitive ownership represents the link between people and place defined by the intellectual, conceptual, or spiritual meanings a group or individual attaches to the place. For each individual, the place is defined by some constructed meaning; that meaning may be articulated through a sense of the landscape within which the place has value. The emphasis of social construction theory is to recognize multiple meanings: the important issue is not the truth or validity of one meaning over another, but merely their identification. Using this approach, the cultural heritage place ceases to be an isolated place, but is relocated within sets of parallel, particular, and cognitive landscapes constructed under the influence of many social and cultural parameters (see Tuan 1974, 1977; Haynes 1981; Gould and White 1986). It therefore becomes one node within overlapping networks of physical, social, cultural, and political linkages, pathways, edges, landmarks, and surfaces.

The upshot of a cognitive ownership or social construction analysis of cultural heritage places is that for every place a wide range of "owners" and meanings can be identified, each with particular relationships with the place and, importantly, with every other owner (Boyd et al. 1996: figure 4). Further sociocultural value studies reveal a further dimension to this issue. In studying or managing such

places, values and owners shift: new values emerge as site significance is assessed or becomes more widely known, or existing values evolve, possibly becoming redundant or elevated in importance. New owners also emerge following changes in public perception of the place as active study or management draws attention to the place. Here, we document such shifts, illustrating them by example, and discussing them in the context of contemporary conceptual models. In this regard, our previous work represents an example of an application of social analysis (social construction theory) in the interrogation of cultural heritage and its management. Progress, however, demands the application of some stronger critical theory, not merely to identify patterns of values but to define processes of value attribution and change (see Fuery and Mansfield 1997).

Context and the gaze: Cultural heritage as text

Given the observations introduced here, and given their implications in terms of potential diversity of value, meaning and cognitive ownership inherent in every cultural expression, and the fluid nature of these values and meanings, a timely revision is in order. It is now necessary to revise the source of value and meaning and to divert attention from the object (the cultural place or artifact) to the subject or observer, or person making value judgments about the place or artifact. As Demeritt (1996: 500) indicates, "For too long we have been debilitated by the notion of disembodied, Olympian truth and the correspondence theory of knowledge." This suggestion is, however, not novel. In reviewing the role of "human agency—of the powers and capabilities of human beings," Barnes and Gregory (1997: 356) draw attention to several important and relevant themes. First is the danger, described by Daniels (1997), of inattention to context and convention, both social and historical. Thrift (1983) reinforces this with a call for a "fully contextual social theory . . . one that is rooted in the continuous flow of social action in time and space" (Barnes and Gregory 1997: 361). Related to this, Daniels indicates the strength to be gained from an evaluation of the subjective over the objective:

> [The] process [of narrative], a dialectic of discovery and construction, can involve complex and delicate adjudications: between the perspectives of participants and observers, between particular incidents and general themes, between competing theories. Interpretation and judgment are ingredients to narrative, not operations performed before or after the evidence has been collected and processed. (quoted in Barnes and Gregory 1997: 374)

Clearly this path of inquiry and analysis has considerable implications for the study and management of cultural heritage. By focusing on context rather than object, one is forced to consider all those people and groups who, by their interaction with the cultural heritage, inevitably create meanings and construct values

regarding that heritage. While some of these constructions may remain purely cognitive, others translate readily to behavior, and here the realm of management practice becomes explicitly implicated. Crudely, what is to be done about the people using the sites? Dressed up as visitors, they can be controlled, educated, entertained, distracted, and so on by the gamut of available practical human management techniques (for example, Uzzell 1989; Pearson and Sullivan 1995; Hall and McArthur 1996). However, where cultural sensitivities tend in a particular direction, some visitors are assigned greater or lesser status: individuals or groups become custodians (officials, Indigenous representatives, and so on) or problems (the skateboarders and pedestrians at Gumbooya; see below). Where officialdom is particularly rigid, defining appropriate designation of authority becomes problematic: only one Indigenous representative, after all, can be the true owner of the midden at Beachmere (see below), and where competing claims are evident, the bureaucratic response denies all validity of values held. By adopting the "Olympian truth" model of a single, objective meaning at any cultural heritage place, Barnes and Gregory's "fluid movements between agency and structure" (1997: 361), the shifting values and meanings held about cultural places by all people associated with these places, are ignored.

This call for a shift in the intellectual tradition informing heritage management is little more than a reinforcement of our opening exposition that the application of social construction theory may inform cultural heritage management. It remains to be considered if some useful theoretical structure may assist in understanding the processes explicit in the "fluid movements between agency and structure" (Barnes and Gregory 1997: 361). This would involve considering the relationship between dominant and subordinate action in society, a relationship that is inherent in social construction theory. This, however, begs the question of the object–agent relationship, and it is with this that we briefly close this section.

The humanist tradition of inquiry contains many starting points for considering the relationship between object (here, the heritage place or artifact) and the agent (the person viewing or interacting with it). A dominant metaphor is the gaze, the active perceptual engagement of the person with an object. Fuery and Mansfield (1997: 70) summarize the idea of the gaze as being "bound up with formations and operation of subjectivity . . . the gaze is not simply the mechanism of perception, but rather a fundamental structure in the ways in which the subject relates to the cultural order. . . ." It is a complex structure, which contributes to the self-making of identity. It allows expression of self-identity through the construction of ideas focused on an object or other subject. It is a potentially reflective process, which requires a form of reinforcement:

> We constantly seek the gaze of some, other (person, group, institution, ideology, etc.) in order to confirm our sense of presence. Making sense of a text—that is, having a sense of relevance for the text, and from the text—is part of the process. When we read we are seeking confirmation from the gaze of the text. (Fuery and Mansfield 1997: 81)

This form of analysis revolves round the acceptance of two other concepts: the object as text, that is, as something to be read; and the meaning of reading emerging from the action of reading, and being constructed by the reader rather than by the author. The extension of these concepts is that all texts are interrelated, that is, that "the constituent parts of a text refer back to, quote, and react with all the other texts that exist around them, and have existed before them . . . [and are] . . . part of some vast interconnecting collection of images, representations, meanings, part-meanings, ideas, impressions, and memories" (Fuery and Mansfield 1997: 56–57). Equating cultural heritage with text, to be read by all those coming into contact with it, provides a powerful metaphor with which to contextualize the multiplicity of values, meanings, and landscape contexts described, as, for example, in the studies below. The multiple social and political readings of the Gumbooya engraved rock site, the diversity of official responses to land-use conflict at the Beachmere midden complex, and the capability of the Byron Bay shipwrecks to acquire new meanings, all represent the gaze. However, they are not simply what Fuery and Mansfield (1997: 56–57) describe as a "mechanism of perception," but rather display their "fundamental structure[s] in the ways in which the subject[s] relate to the cultural order," properties that are embedded in the cultural heritage and its diverse constructions. The intertextuality of these examples is articulated in contentions surrounding these items of heritage. Identifying multiple landscapes into which the individual heritage places and items may be articulated reinforces the essential intertextuality of the constructs surrounding these places and items (Cotter et al. 2001). Furthermore, adopting the metaphor of text as an analytical device opens the way for an analysis of cultural heritage that expands the range of acceptable views and meanings for that heritage. In particular, the multiplicity of gazes becomes acceptable, as does the continuing action of redefining and multiplying values.

The liberating implications for management must be evident and will be developed below. It should be noted, however, that in practical terms, cultural heritage management could be enhanced by adopting relatively simple conceptual models of value and action structures for analyzing environment–people relationships. Two such examples are Porteous's (1996) model of the interaction between scientific rigor and political urgency in defining dominant intellectual and practical approaches to environment issues, and Short's (1991) links between myths, ideologies, and text in the study of relationships between environment, culture, and society. These and many other models provide useful practical constructs to link the complexities of cultural theory framing and intellectual acceptance of multiple read meanings, the complexities of multiple constructions of cultural heritage meaning inherent in any pragmatic view of cultural heritage, and approaches to cultural heritage management sensitive to these complexities.

Some readings of cultural heritage places

> In considering . . . problems it is easy to believe, each to ourself, that the issues and problems are clear, the processes understood and the solution therefore at hand. If this were so it would be good. Such views are generally rapidly dispelled if the views are articulated to others. Then the range of views press on us, and the lack of common knowledge becomes apparent. . . . One of the greatest problems in modern life is the enormous range of messages in the milieu in which we live. Our lives are overcrowded and we deliberately switch, selecting what we want to hear and react to. . . . In all this we run into the wide range of views and attitudes. In one way it is a great feature of our society that we have our diversity of values, beliefs, attitudes and understandings; it leads to our fascinating lives as human beings. (Johnson 1994: 46–48)

Thus, an environmental scientist synthesizes the human contribution in comprehending complexity in environmental degradation. The emergence of the common theme in any discussion of environmental degradation that there are as many perceptions and understandings of the degradation process as physical factors, and thus of the practicalities of environmental management, the conception of complexity and diversity of opinion regarding underlying causative effects becomes a useful analytical artifact (for example, Dovers 1994). Likewise, we can turn to the practicalities of studying and formulating realistic management practice in cultural heritage contexts. As indicated above, the values, equivalent to the perceptions and understanding referred to above, may be diverse, and, importantly, lead to equally diverse management practice.

In this section, case studies are presented, not for their own sake but for the light they shed upon processes or structures of value formulation. The processes importantly reflect the existence of fluidity and evolution of ideas and values attached to cultural heritage. Equally, they highlight the influence of the politics of site management and the effects of networks of interested people upon the construction of meanings and values, which in turn guide people's cognitive association with these cultural places.

Six case studies from coastal New South Wales and southeastern Queensland (Australia) independently provide an insight into the way the meanings and values attached to places evolve and conflict during their public exposure. They loosely cluster into three classes of cultural heritage place.

- Historical shipwrecks: Suffolk Park, where a public campaign of concern developed over the potential destruction of a shipwreck site, and Byron Bay, where a confusion of cultural and natural values developed within efforts to develop a management strategy for the recreational use of a shipwreck site;
- Historical settlement places: Woody Head, where a study of the values of place held by long-term campground residents resulted in a sophisticated

geohistorical statement of personal values, and Alstonville, where a landscape heritage study increasingly elicited community understandings of historical values associated with the landscape; and
- Aboriginal places: Beachmere, where legal considerations of conflicting land use provided the stimulus to articulate a diversity of values, meanings, and interest in the Indigenous cultural landscape of this coastal area, and Gumbooya, an Aboriginal rock engraving site in suburban Sydney, where some unconventional site uses highlight the inadequacy of a unitary value system.

Each study emphasizes that while underlying community knowledge of historic and cultural values was attached to the places, the action of studying these values resulted in an evolving construction of interests and values. The involvement of academic researchers, public campaigners, and public administrators led to the places becoming increasingly and more complexly valued as historic and cultural places by the community.

Readings of two historical shipwrecks

The Suffolk Park buried shipwreck

At Suffolk Park, a historic shipwreck is buried within coastal sands. That the vessel was there has been known since the 1920s, and it was reencountered during sand mining in the 1960s. Its exact location has been lost, and there is an opinion that the vessel's remains may have been destroyed during the sand mining. However, several artifacts were removed in the past, and their recovery a few years ago in part stimulated a renewed interest in the vessel. For various reasons, the shipwreck was originally considered to be of considerable antiquity but was later proven to date from the late nineteenth century (Boyd et al. 1993, 1994; Boyd 1995). This shipwreck has attracted much interest from community and professional groups (Boyd and Cotter 1996; Boyd et al. 1996).

Of importance here is the history of interest in this place. Much of the recent renewed interest stems from a local campaign against a proposed residential development. Prior to this campaign, local residents had been aware of the vessel and had considered it to be part of this coastal area's shipping history. However, one of the campaign's chief participants identified the shipwreck as part of the natural and cultural heritage threatened by development, and thus part of the evidence required to disallow any residential development (it was later shown that the proposed development did not actually affect the place). Closely allied with this campaign was the creation of a history, now shown to be largely fallacious (Boyd et al. 1994). In essence, the presence of the vessel was conflated with a particular interpretation of Aboriginal stories of a massacre of early sailors following a shipwreck and altercation involving the rape of a local Aboriginal woman or women. This interpretation was supported by estimates of the story's

age by reference to the generations of storytelling associated with it, and by putative identification of a local rock feature as a primitive fort in which the sailors may have sheltered. This interpretation implied an age for this European ship predating, possibly by several centuries, the earliest documented European presence on this coast, and thus attracted considerable public attention. Consequently, amateur and professional historians, archaeologists, and other academics became involved, as did officials of the Heritage Branch of the New South Wales Department of Planning, and members of the public. Each of these people or groups acquired an inherent interest in the site and contributed to the understanding of this heritage site.

The current understanding now depends upon the individual interpretation held. The scientific evidence indicates a recent age and thus lesser historical significance, and the official view largely corresponds to this interpretation, although with some difference of details. A section of the community probably still considers the vessel to be older, and prefers the original interpretation. An interesting development is the Aboriginal involvement. While the site is strictly not an Indigenous one, the early interpretation of association with European–Aboriginal contact has considerable Aboriginal significance. As the issue ran its course, the local Aboriginal elders notably reiterated the early-presence interpretation, and thus gave it the respectability of received tradition, probably reinforcing community acceptance of this interpretation.

The Byron Bay historic shipwreck heritage

The management of historic shipwreck heritage may seem a relatively benign undertaking, largely devoid of issues of cultural interaction, misappropriation, and inappropriate context that may influence the management of Indigenous places, and largely focusing on practical matters of material conservation. This assumption is to a degree reflected in the relatively straightforward assessment process used by government agencies in reviewing the cultural significance of shipwreck sites (for example, Heritage Office 1996a, 1996b). At Byron Bay, generic heritage assessment guidelines (Anon. 1990) were adapted to suit the local underwater heritage (Clegg 1997). Evaluation followed official state guidelines and represented the traditional approach to defining cultural heritage values. It followed a three-stage process of (i) investigating the range of heritage values, (ii) interpreting and comparing heritage values, and (iii) classifying the significance. Thus, heritage values were first defined by reference to historical, scientific, cultural, social, archaeological, architectural, aesthetic, natural, and Aboriginal significance. Interpretation then focused on rarity, group value, landmark value, representativeness, and integrity, and finally classification placed these significances in local through to global context. The emphasis is on the cultural and social elements of cultural heritage, and in reality it is these elements which will determine the managerial fate of a place. While Clegg was able in this case to identify some significant elements of (mainly) historical, social and ar-

chaeological importance, and thus to make a case for further investigation, he also made passing comments of some relevance to the discussions here. In the case of the wreck of the ship Wollongbar, he noted that the site serves as habitat for endangered marine species. A similar conclusion was drawn for nearby historic jetty remains, which were noted to provide a hard substrate and thus a refuge for marine organisms atypical of this sandy bay. In the case of the wreck of the Tassie II, openings within the wreck provide habitat for green and loggerhead turtles, both identified under Schedule 2 of the New South Wales Threatened Species Conservation Act (1995). The significance is that the wrecks provide a hard substrate within a largely soft-bottomed bay, introducing a micro-environment highly suited to these endangered animals. This cultural heritage's significance has thus moved considerably from its initial role as historic monument, with all the social and archaeological implications such a definition brings, to being items of significant environmental importance. This expansion of value, however, continues. Presently, consideration is being given to these sites as recreational places. Based on their historical interest and their emerging natural values, they are now acquiring recreational value, only, one suspects, to be further enhanced by the increasing natural value of these places.

Readings of two historical settlement places

Woody Head recreational campground

Woody Head is a small settlement within the coastal Bundjalung National Park of northern New South Wales. The location comprises a rocky headland, extensive tidal rock platforms, beaches, and a sheltered bay. Importantly, the settlement includes a campground used for much of the twentieth century by residents of nearby rural towns, and it has been often used by these residents over many years. Facilities include a shop, National Parks buildings, and a boat ramp. The locality has a long Indigenous association, including an interdependency and interrelationship between the local Yaegl people and the land, defined in terms of Yaegl mythology. However, non-Indigenous use forms the basis of the study reported here (Taylor 1997), a study centered on the place as a recreational place set within the culture of long-term, if periodic, residents of the campground. Woody Head's non-Indigenous history revolves around recreational activities (camping, fishing, swimming, and boating) and professional fishing. Through the use of intensive interview methods, the study of the meanings that non-Indigenous residents attributed to the place was founded on a recognition that meanings are not essentialist, but subjective and formed by groups and individuals, and that the meanings and their interpretation reflect the complex of social and cultural relationship of both interviewee and interviewer (Maykut and Moorhouse 1996; Taylor and Bogden 1984; Tuan 1974, 1977). The study was open to a complex diversity of expression of meanings, an openness appreciated

by the interviewees. Reporting the findings to the participants, interestingly, appears to have enhanced their sense of value and meaning and provided sanction to previously nonexplicitly held views.

In practical terms, the study was structured round the initial identification of groups of cognitive owners: eight groups were identified, and a single member of each was interviewed. These private views were complemented by official views derived from documents relating to the place. These sources revealed many meanings of the relationship between residents and place: the cultural constructions of the place. These were embedded in the perspectives of each participant and official group, and appear to be related to the background of each, reflecting, for example, personal attributes such as gender and age, and cultural, political, social, and economic structures that define the participants' lives and life histories. Structuring the emerging meanings provided eleven broad categories (the following headings are given in keeping with the personal approach of this work; the participants' own words are used): Freedom (a place for the different and new); Familiarity (continuity and ritual); "Woody Head as an inspiration for me"; "It's part of our culture" (the culture(s) of Woody Head); Conflict and power; Woody Head (money and work); "It's a safe place"; "A people's place" (family, friends, and generation); "A whole pile of memories"; The landscape; "It's just a very beautiful place"; and Woody Head is "special."

These clusters of meanings were spread across the eight owner groups. Many, such as those expressing ideas of safety and recreational values, were evident across diverse groups. However, conflicts of meanings were also evident where fundamental constructions of meaning differed, such as the National Parks and Wildlife Service's perception that people were only visitors to Woody Head (the service is the official manager of the place). The permanent site holders, on the other hand, consider Woody Head to be an integral part of their lives, and, based on a significant history of presence and the essential cultural role the place plays in their lives, that the place belongs to them and they to it.

Beyond these parallels or conflicts, however, it was also evident that the meanings identified are not confined to one boundary or under a single heading. They are fluid; they cross and meld within each story of meanings. They change and reflect each other in the telling, forming a complex, total but ever-changing view of Woody Head and the meanings constructed around it. In particular, the mixture of meanings appears to get more complex over time, with the interweaving of human, place, landscape, and meaning, at times resulting in increasing depths of feeling for Woody Head. As noted above, the very process of this study contributed to this dynamic evolution, assisting in part to articulate and reinforce or support certain expressions of these cultural meanings.

Alstonville historic town and countryside

The Alstonville study attempted to determine, as part of the local environmental planning processes, whether the surrounding rural landscape was deemed a valu-

able landscape of cultural significance (Gardiner and Knox 1996; Gardiner 1999). Alstonville is a relatively small, rural village, founded in the early twentieth century in the relatively densely populated rural area of northeast New South Wales, and located on a basalt plateau close to an escarpment overlooking the ocean and a plateau edge with views toward forest-covered mountains. The plateau is regarded as a distinct entity within the region, and the town tends, as with many small towns in the region, to have a distinct if often not clearly articulated identity. With little previous heritage assessment in the immediate area, the local community was consulted to identify local indicators of cultural significance, community understandings of values attached to the landscape, and any particular senses of attachment to heritage items.

This study adopted a social value methodology (Johnston, 1994), placing emphasis on the expression of social values as indicators of a significant interest in an area's cultural heritage. The study revolved around group and individual interviews, with younger people being engaged through a high school photographic assignment. In this study, the term *heritage item* became a general one referring to items of cultural significance and largely reflecting community expressions of what was considered to be cultural heritage. As a truly social construction, the term was defined in response to the participants' developing expression of cultural heritage and included a wide range of places and objects: moveable objects, relics, street trees, cultural landscapes, towns, buildings, gardens, conservation areas, waterfalls, swimming holes, and so on. This approach confirmed that people develop attachments to places as a consequence of using these places over time, and it acknowledges that there is more to heritage studies than what is usually gleaned from historical or material research on the physical landscape (Gardiner and Knox 1996, 1997; Gardiner 1999).

Prior to this study, twenty-four local places had been listed on the registers of the National Estate, the New South Wales National Trust, and the Ballina (that is, local) Shire Council Local Environmental Plan. Following this community participation study, in which participants were encouraged to think of heritage in broad terms such as natural features, historic items, views and travel routes, landmarks, and community places, over a hundred items were identified as locally important. Notably, this list was much wider than those in the various official registers, including such items as local waterfalls (important in social history as well as for aesthetic values), land activities such as peanut cultivation and "stooking" (regionally and aesthetically distinctive), public works such as the local Duck Creek weir, and landscape views. Furthermore, most formally listed items were considered important to the community. The omission of some items, however, may have been an artifact of the survey or a reflection of shifting public knowledge or values.

By broadening the expression of cultural heritage, notably by encouraging the community to construct its own expressions of significance and value, several consequential outputs now contribute to the redefinition of the area's cultural

heritage. These outputs include a formal report identifying community-based heritage items, now lodged in local libraries, public talks to community groups, heritage tours to special places in the area, a heritage main street study, a heritage information board for public display, and a successful application for listing on the register of the National Trust of New South Wales. These all have an impact upon the community and its respective memory and attachment to heritage items, and thus have redefined the public understanding and expression of the cultural heritage value of the area.

Readings of two Aboriginal places

Beachmere Aboriginal midden complex

Issues of heritage value definition at the Beachmere midden complex in Moreton Bay, southeast Queensland, emerged as a by-product of litigation associated with an application for sand extraction. Here, Aboriginal archaeological sites formed the focus of community and professional interest during the litigative process (Boyd and Cotter 1996; Boyd et al. 1996). That process required explicit statements of interest from all parties, and allowed for a detailed examination of the relative roles and views held by each party. The midden complex, comprising shell middens of varying size and age, is a valuable regional archaeological resource whose integrity is threatened by recent land-use development. For this discussion, what clearly emerged from the litigative process was the diversity of interest and range of groups who claimed cognitive ownership of this cultural heritage. Importantly, some cognitive owners, especially local residents, became aware of their role only during the process. Equally, several Indigenous groups claiming right of ownership, and each defining that right differently, became apparent only when their role regarding the site needed to be clarified. For each group, a social, political, cultural, and economic context can be described, and for each context, subtle differences in inferred cultural value can be identified.

Of particular interest in this analysis is the complex of interactions between identified groups. From mapping the web of relationships between groups, it became apparent that neither the notion of cultural place nor the interests of groups in cultural places were static or absolute (Boyd et al. 1996). Each may be influenced by links between potential stakeholders (government legislation, for example, may affect the way groups and individuals define and express their association with a cultural place) and by the dynamic nature of the relationships between individual groups and cultural places. The mining industry, for example, has a capacity to create, destroy, modify, and interpret places of cultural heritage value, depending on criteria such as the nature of the place, economic imperatives, and historical perspectives. Indeed, by mapping the web of relationships, an ecological-type system became evident, defined by cognitive owners, landscape ideas and values, strategic and political relationships, and so on. Few components were static, and shifts in one necessarily affected all others.

Whatever the focus, a striking element of this analysis was the complexity of this cultural place and its definition as either an isolated site or a cultural landscape and, by implication, the potential effects such interpretations have on stakeholders and their competing interests. Previously, with reference to the notion of *midden complex*, a cultural landscape model encompassing past and present Indigenous landscapes was deemed appropriate for the interpretation of the area's cultural heritage. It became clear from the nature and number of identifiable cognitive owners, however, that many claims of association with or cognitive ownership of the midden complex existed. Interestingly, it was evident that the very nature of the perceived threat to the heritage in part defined those groups and individuals claiming association with the heritage, and had the potential to introduce values seemingly unrelated to the original issue.

A perceived threat to the broader regional environment produced claims of association by such regional groups as the Sunshine Coast Environment Council and the Bribie Island Environmental Protection Association, whose concerns related largely to wildlife habitat change and depletion. The principal non-Indigenous community group was the Beachmere Community Association, whose claim of association was based on the threat to local amenity expressed in terms of ecological damage, pollution, increased traffic, and potential land devaluation. Interestingly, from an Aboriginal cultural heritage management perspective, local residents supported those Indigenous community groups who, largely because of inadequate consultation and a perceived threat to their cultural heritage, opposed the sand extraction operation. Much of this non-Indigenous community support can be attributed to genuine concern for Aboriginal cultural heritage, although some of this support appears to have been political: Indigenous cultural heritage issues, because of their complexity and sensitivity, were perceived to be pivotal in preventing the sand extraction operation.

Five Indigenous community groups were identified in this process: FAIRA (Foundation for Aboriginal and Islander Research Action), the Dalaipi and Jindoorburrie organizations, and two tribal groups, both referring to themselves as Gubbi Gubbi. FAIRA makes a claim of association on the basis of a general concern for Aboriginal cultural heritage and a perception that inadequate research was employed in the original environmental impact statement to establish legitimate claims to cognitive ownership of the midden by Aboriginal groups involved. Although FAIRA has interests shared by all Indigenous groups, all such groups did not support its advocacy role. The two Gubbi Gubbi groups claimed cognitive ownership of the midden complex and surrounding area on the basis of tribal and kinship affiliations, but differed in their form of kinship. In contrast, the Dalaipi group is a social action organization primarily concerned with assisting local Aboriginals with access to housing and health care, and it is intimately linked with the Jindoorburrie organization. These two groups associate with the midden complex by a social and historical attachment to the area and a clear delegation of cognitive ownership rights to the cultural heritage via a tribal affili-

ation with the Undanbi tribe, which is considered by the Jindoorburrie to be the only tribe with ownership rights to the midden. This denies the Gubbi Gubbi claims of exclusive ownership based on tribal affiliation.

These competing claims of tribal affiliation introduce complexities to the cultural heritage management of this midden complex, and they are further complicated by the association of group members with external bodies as government and industry advisers. A trainee heritage officer with the Department of Environment and Heritage, for example, both has affiliations with the Dalaipi and Jindoorburrie organizations, as well as a historical link to the area as a former resident, and is influenced by departmental policy and research methodology. Whether real or imagined, potential conflict of interest arises, possibly affecting the implementation of government policy and, more importantly, giving one group preferential access to the decision-making process.

Gumbooya Aboriginal rock engraving site

Gumbooya, an Aboriginal rock engraving site in Sydney, New South Wales, is superficially less contentious: there are no matters in litigious contention here, although the study of associated values and cognitive ownership yielded some less tenuous, but theoretically more important, processes. Gumbooya Reserve is an area of bush and rock outcrops in the northern suburbs of Sydney with Aboriginal rock engravings typical of the area's Aboriginal cultural heritage (Sattler 1995; Boyd and Cotter 1996; Boyd et al. 1996). Several official bodies (the National Parks and Wildlife Service, the local Shire Council, and the regional Aboriginal Land Council) have responsibilities for this site, but on investigation of community interest, several additional important and entirely unofficial public groups were identified as having inherent interest in the site. They all thus have claims as cognitive owners. The rock surfaces provide short and convenient pathways through the reserve between residential areas and the local College of Technical and Further Education and a shopping center. Furthermore, some of the rock surfaces provide ideal ramps and ledges for skate boarding, a use encouraged by the fact that this site is more conveniently located than local official skateboard ramps. Officially, management issues at the site cover a range of typical issues: control of access, interpretation and representation of the site as Aboriginal heritage, control of weeds and other physical intrusions, and removal or limitation of sources of damage to the site. When appropriate management was being determined, it became apparent that the various groups with some legitimate interest in the site hold very different conceptual values regarding the site, and each places the site within a different geographical context.

The official bodies have some legitimate access to ownership, albeit framed within the limits of their jurisdiction; this is moderated by the individualistic approach of individual staff members, who are influenced by not only the culture of their employer but also their own personal cultural context and experience. The National Parks and Wildlife Service has a statutory obligation to protect and

preserve the site and therefore officially places the site within the context of the totality of Aboriginal sites, both as physical entities and as cultural items, in the state. The service staff, while working within the service legislative and institutional context, tends to impose a greater personal sense of value upon the site as both an Aboriginal and a natural site of local and regional importance. This duality of value results in the staff placing the site both into a statewide, official context, defined in terms of the distribution of Aboriginal sites, and into the local and regional contexts of such sites and their local and regional distribution and Aboriginal meaning. Furthermore, the value of this particular site is enhanced when viewed as a node of uncharacteristic nature within a specifically urban geography. The local government authority responsible for this area takes a different value stance for this place. Whereas individual staff members recognize heritage value in the site, official interest provides indirect cognitive ownership of the cultural heritage, constructing the site as a place of natural bushland conservation and protection. Geographically, values are localized within the geographical and socioadministrative context of local government authority.

The third official body provides interesting comment upon the emergence of site-specific value. The relevant local Aboriginal Land Council represents Indigenous views in this region and has, ostensibly, the greatest claims of cognitive ownership of a site such as this. It, after all, represents the activities of the cultural ancestors of the region's Indigenous people. The Land Council and its members clearly view this site as an intrinsic part of both the past and present Indigenous cultural heritage: it is representative not merely of past events, but is a physical manifestation of present Indigenous residence. However, interestingly but perhaps unsurprisingly (there are many such sites in the region), the council did not know of its existence prior to late 1995, when it was approached by a researcher inquiring about the values and relationships between people of this site. The council, therefore, did not have a specific cognitive interest in the site, but found it very easy to transfer a general interest in such sites to a specific interest in this site: this transfer was done in a matter of minutes during an interview. Once done, the site became valued on a number of planes. Its intrinsic value as an engraving site dovetailed well with the council's view of a network of sites under threat by conflicting land use within the council's jurisdiction; as a site type, it could also be placed into a broader regional distribution of like sites. Most importantly, however, the site was immediately placed into a political landscape of Aboriginal claim to sites and the desire to exclude (most) other people and uses from the site; its engraved symbolism became subsumed into a strong contemporary political symbolism.

Despite these official statements of value, further interest is evident. Local, non-Indigenous residents played a pivotal role in defining this cultural place. A group of pedestrians valued the site as a convenient pedestrian thoroughfare: this valuation has bearings on site management, and other than indicating a construction of place in terms of local geography, adds little to the development of cultural

value. A second group, local skateboarding youths, took a much more active role in developing cultural value. The location and geometry of the site makes it a most suitable and accessible skateboard site, and local youths value this site as such. However, in doing so, they are reinforcing values of a local subculture and marking the place as a focal point of that subculture. This may be seen as a natural extension of the original function of Indigenous engraving at the place: it has heightened value within the culture of the social group using the place, which contributes to the self-definition and assertion of that culture. This activity, therefore, imparts upon the site a sense of heritage value integrally associated with contemporary youth culture, which, while it may be most closely associated with original site function, is likely to elicit the strongest opposition from other cognitive owners.

The final group, while also apparently being relatively benign, a benignity marked by the lack of any opposition to its activities, possibly presents a cultural process of equal import to the skateboarders' cultural redefinition. There were local residents, mainly those whose houses back onto the reserve, who had developed a sense of the site being important as an Aboriginal place. One resident adopted an unofficial custodial role, keeping an eye on the site and keeping the site tidy and in good repair. This was the strongest sense of custodianship displayed by any of the parties associated with this place and to some extent had replaced the traditional Indigenous custodial role at the site.

A discussion: Rigidity or a changing order?

> An important feature of colonial discourse is its dependence on the concept of *fixity* in the ideological construction of otherness. Fixity, as the sign of cultural/historical/racial difference in the discourse of colonialism, is a paradoxical mode of representation: it connotes rigidity and a changing order as well as disorder, degeneracy and daemonic repetition. (Bhabha 1994: 66)

> Every commodity reproduces the ideology of the system that produced it: a commodity is ideology made material. . . . Culture [is] the active process of generating and circulating meanings and pleasures within a social system: culture . . . can never be adequately described in terms of the buying and selling of commodities. . . . In a consumer society, all commodities have cultural as well as functional values. . . . The audience . . . now becomes a producer . . . of meanings and pleasures. The original commodity . . . is, in the cultural economy, a text, a discursive structure of potential meanings and pleasures. (Fiske 1989: 14, 23, 27)

While the case studies represent empirical observations (but consider the implications of the concepts of heritage as text), it is important to consider whether they

can be framed within broader conceptual contexts. Are they unique observations or examples of general cases? A growing literature of critique identifies cultural values as complex, in many cases intangible, and certainly multifaceted. Bhabha's observation of the role of fixity in the colonial discourse provides a valuable starting point in analyzing the examples. Bhabha's fixity, of course, is presented as a foil for a discussion of the diversity and fluidity of cultural values and the diversity of expression, whether viewed as a reading or as an articulation of cultural values. Fiske's analysis of popular culture indicates a useful direction that such discussion may take, one in which the processes of generation and circulation or expression of meanings as cultural commodities allow some understanding of the system within which they are evident. In practical terms, this may provide a guide to the practice of cultural heritage management.

However, returning to the colonial allusion is an important step. By doing so, one is forced to contemplate the concept of cultural heritage management. In the immediate sense, cultural heritage management is about "making better decisions concerning culturally important places" (Pearson and Sullivan 1995: 8). In practical terms, this involves the identification, assessment, and evaluation of individual objects and places, and the formulation of plans, strategies, and practical work schedules. In implementing such schemes, issues of material conservation, visitor management, education, public access, record keeping, research, and so on become increasingly important. However, all this is predicated on an underlying Western philosophy of the value of culture and its representative, heritage. This heritage may be divided into cultural places, a rather amorphous concept including in many instances the entire landscape, which represent the mark of humanity on the earth's surface, and heritage places, which tend to be more localized and contain "some degree of heritage value or significance for people today or in the future" (Pearson and Sullivan 1995: 7). However one defines cultural places or heritage places, that definition reflects the underlying ideology of the society making the definition. Although originally aimed at understanding items of popular material culture, Fiske's comment that "every commodity [read cultural heritage item] reproduces the ideology of the system that produced it: a commodity [cultural heritage] is ideology made material" is most apt here (1989: 14).

Cultural heritage management stems from a long Western antiquarian intellectual tradition of examining the past (for example, Horton 1991; Renfrew and Bahn 1991), founded in the Renaissance and the emergence of modern science from the natural history tradition. This tradition may be couched in terms of the "discovery of 'truths' and 'facts,' or rather claims for the possibility of objective truths about the world and 'Man's' place within it . . . and thus considered as a set of discourses concerned with the possibilities of representing reality and defining eternal truths" (Walsh 1992: 7). However, in reality it is and has been set firmly within the sociopolitics of the places and times, predominantly eighteenth and nineteenth century Europe, in which it emerged. Any careful examination of the

social context of science (sensu lato) is likely to reach similar conclusions to this: that "scientists are perhaps too slow to consider the connections between their interventions in the laboratory and structures of social domination. . . . Scientific knowledge is mediated, embodied knowledge and . . . scientific facts are socially constructed" (Demeritt 1996: 500). In a nutshell, the intellectual tradition from which cultural heritage management is derived and from which it maintains its place in modern Western society is the colonial expression of the positivist, reductionist, and specialist scientific tradition. Such tradition, as indeed any tradition does, determines a limiting range of possible relationships between human groups (the colonist, with a baggage of Western perceptions of racial, ethnic, and social hierarchies and conditions, and the Indigenous or Aboriginal), between people ("Man") and nature, and between people and knowledge. This melange creates real boundaries to the type of management of cultural heritage possible within a society. Certain expressions of culture are acceptable (the high culture of opera, classical music, certain visual art forms, architecture as art rather than utility, and so on), whereas others, such as popular music, popular forms of dress, and utilitarian technology, are not. Certain values may be applied to the assessment of the quality of these expressions of culture, these values usually being those of the educated, middle- to upper-class, and, often, white and male part of society. Certain evidence is acceptable, with, for example, so-called objective or scientific evidence usually outweighing folklore, storytelling, or mythology (where these latter forms are even considered). Overlaps between, for example, historical and contemporary, high and low culture, social and aesthetic expressions, and cultural and natural tend to be treated conservatively. Ethnocentric thinking and ethnic stereotyping, however well disguised, inevitably influence thinking and action. Facts are privileged over opinion and value. Finally, in terms of the actual practice of cultural heritage management, a minimalist (even reductionist) approach is generally favored.

We return to the assertion, based on observation, mentioned in the beginning, that the tradition of (Western) cultural heritage management has been to define cultural places in culturally, temporally, and geographically limited ways, and that such definitions tend to be conservative: monocultural or monoethnic, to a lesser extent monotemporal, and most frequently microgeographical. This form of definition assumes that (i) the cultural place is defined by reference to one cultural or ethnic group who claims or is attributed sole rights over the cultural capital of the place; (ii) the place is identified in terms of a static history fossilizing meaning to few single points in time; and (iii) the place is defined by its immediate surroundings as an individual point apparently unrelated to its landscape contexts. All else in the practice of cultural heritage management thus follows a limited path.

In this paper, we argue, however, that by opening the definition of cultural heritage, by refocusing from object to subject, by allowing recognition of the social construction of multiple and fluid meanings, by privileging the multiple

readings of cultural heritage, and by accepting a diverse and fluid cognitive ownership of cultural heritage, management may be liberated from such limitations. Culture, time, and geography may be harnessed to create insightful and dynamic understandings of cultural heritage rather than be used to encase that heritage in restrictive boundaries.

A conclusion: Liberation and the power of social formation

> The role of the critic-analyst, then, is not to reveal the true or hidden meanings of the text, or event, to trace the readings that people make of it; rather, it is to trace the play of power in the social formation, a power game within which all texts are implicated and within which popular culture is always on the side of the subordinate. . . . A reading is the interplay of tactics and strategy, it is a poaching raid, it is part of the power game of culture. . . . Popular readings are always contradictory; they must encompass both that which is to be resisted and the immediate resistances to it. (Fiske 1989: 45)

In this paper, we attempt to follow Fiske's suggested path, the tracing of power in social formation, by accepting the inherent validity of diverse meanings attached to cultural heritage evident by observation (albeit only one of the many possible readings available). In particular, we highlight several matters: the important and critical consequence of diverting attention from the cultural place or artifact as object to the subject as observer or person making value judgments about that place or artifact; the diversity of meaning that may be read into the cultural heritage, where that heritage is viewed more as text than as essentialist object; the pivotal role the investigator may play in influencing readings of the heritage; and that existing meanings may evolve through time and new meanings emerge.

The argument, therefore, becomes liberating because it accepts the legitimate right of multiple meanings as being representative of cultural heritage and rejects notions of essentialism in cultural heritage. It also accepts the fluidity and, at times, contradictory nature of these constructions of meanings. It does so for good reason: by such acceptance, cultural heritage management should invariably become more inclusive and imaginative in its application. Management thus would become a matter of identifying the poaching raids, not to detect, deflect, or deter them, but to acknowledge them and to integrate them into a more imaginative management. By doing so, of course, management would be successfully subverting the constructed meanings: the meanings often built at the popular or subordinate edges of the mainstream society managing (and traditionally defining in limited essentialist terms) the cultural heritage. By doing so, it will invariably stimulate further construction of meaning. And here we return to our starting point, to the Bhabha's "paradoxical mode of representation: the rigidity and . . . changing order . . . degeneracy and daemonic repetition" (Bhabha 1994: 66).

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7

The U.S. National Register of Historic Places and the shaping of archaeological significance

Barbara J. Little

I wish to highlight the connection between the public nature of archaeology and the public nature of the National Register of Historic Places, especially as it is now perceived and presented. Listing in the National Register ascribes status to archaeological resources that they otherwise do not have. In the case of precontact sites, such status helps most (non-indigenous) citizens understand and better appreciate the long-term history of the land that is now the United States. In the case of postcontact sites, such status helps the American public to understand that the history of America as colony and nation includes archaeology. There are, therefore, implications in the severe underrepresentation of archaeological properties in the national lists.

The National Register of Historic Places

The Historic Sites Act of 1935 authorized the Secretary of Interior to recognize as National Historic Landmarks (NHLs) nationally significant properties in United States history and archaeology. The National Historic Preservation Act of 1966 (NHPA) expanded this recognition to properties of state and local significance with the creation of the National Register of Historic Places. All NHLs and cultural units of the National Park System are automatically listed in the National Register. The National Register, therefore, is meant to be a comprehensive official list of the United States' cultural resources considered worthy of preservation. To be listed, tangible properties must be significant and have sufficient integrity to convey that significance.

The passage of the NHPA was a response to the unfettered development, urban renewal, and widespread destruction of historic places in the post–World War II years. This preservation act does not necessarily protect properties, but legislation and regulations ensure that there is consideration of historic properties if federal funds or permits are involved in projects. The fate of archaeological

sites or any other historic property on private land, where no public money is involved, is completely in private hands.

The National Register in context

Many archaeologists working in the United States would say that there is no point in going to the trouble of preparing a nomination and working with the state (or federal or tribal) historic preservation office to nominate an archaeological property because under Section 106 of the NHPA, the same protection is provided for a site that is determined eligible for listing as for one that is actually listed. (See http://www.cr.nps.gov/linklaws.htm for the text of laws and regulations.)

If the purpose of the National Register were to simply flag sites for mitigation or avoidance, then this response would be reasonable. However, the National Register, established over thirty years ago by the same legislation that gave us the Section 106 process, has become much more than "a list of places worthy of preservation," and archaeology has become much more than it was in 1966 as well.

During the first several years of the NHPA, properties were afforded consideration only if they were actually listed. Executive Order 11593 in 1972 and later amendments to the act in 1976 expanded that protection to unlisted eligible properties, spawning a whole industry of cultural resource management (CRM) tied to all kinds of projects with federal involvement. Reference to *Section 106* in U.S. archaeological parlance refers to this provision of the act. The National Register criteria have become enormously important in U.S. archaeology. They are applied far beyond the actual listing of sites to nearly every potentially threatened site on federal, and much state, land. It is clear that state offices, where many of the day-to-day recommendations about significance are made, use what is currently listed on the register as a guide to determining what is eligible for the register (for example, Kuhn and Little 2000).

The legislation itself was created over several years under lots of influences. The "New History" was actively promoted in the 1960s, but its practitioners were not extensively involved in the preservation movement, which was influenced by a separate section of the history profession. The "New Archaeology," in contrast, was more actively promoted, and, although not the sole influence on the legislation, its "scientific," "problem-oriented," "and deductive" approach was codified in the way that the National Register criteria were written and applied to archaeological sites.

The data-gathering industry that resulted from this legislation and its amendments changed the way American archaeology was done. Reflecting on the thirty-year anniversary of the law, Hester Davis (1996, 44) recently wrote: "Without the *National Historic Preservation Act,* archeology might have remained a largely esoteric endeavor. With the *National Historic Preservation Act,*

archeology has been transformed into *public archeology,* and has changed the future of the past forever." We archaeologists often behave as if we can have our choice of both worlds: We seem to want the control and secrecy that being an esoteric endeavor allows, and we also want public interest and knowledge and the public law that supports much of the work we now do.

The data collected since the mid-1970s has far outstripped either our ability or our will to synthesize it. There is an ironic twist to the results of the data collection, problem-oriented approach codified into public law. The Section 106 process has become such an efficient management tool that land management needs rather than archaeological research goals control the process. Quite opposed to the goals of problem-oriented archaeology is management-driven archaeology, wherein research in many cases has become so generic that the specifics are irrelevant. We often end up seeking to answer the same important questions. In some states, the same generic summary of the past (the they-made-stone-tools-and-hunted-and-then-they-made-pottery-and-planted sort of history) precedes the actual report of survey or test results. There may be little attempt to place results in the context of what is known or, more importantly, what may be new and challenge what is known. It is no wonder that some parts of the public are questioning what we have learned and whether we continue to learn enough to make it worth spending public money (see Altschul, this volume).

If a site is determined eligible and is going to be affected by a federal undertaking, then generally it is either avoided or mitigated by data-recovery excavation. If a site is mitigated, basic site report information may get entered in the National Archeological Database (NADB) or in some comparable accessible database. That does not seem to happen frequently enough. If avoided, a site is a perfect candidate for nomination to the National Register, but that rarely happens. Consider that the register annually receives approximately 1,200–1,500 nominations, while about 12,000 properties are determined eligible by the states (NPS 1997). No national database of properties determined to be eligible is available; often that information remains buried in survey reports or office memos. That is, it virtually disappears. When information on sites disappears, it becomes inaccessible to the public, and that loss tugs archaeology back into the esoteric endeavor it once was.

The National Register criteria for eligibility

Properties are nominated by states, federal agencies, and Indian tribes under four criteria: their association with important (a) events, (b) persons, (c) architecture, art, or engineering, or (d) information. (See table 7.1 for the full criteria.) When listed, archaeological sites are nearly always included under this last criterion, that is, for their important information. Other significance is occasionally acknowledged; for example, spectacular ruins in the Southwest are sometimes

Table 7.1. The National Register criteria for evaluation

The quality of significance in American history, architecture, archaeology, engineering, and culture is present in districts, sites, buildings, structures, and objects that possess integrity of location, design, setting, materials, workmanship, feeling, and association, and:

a) That are associated with events that have made a significant contribution to the broad patterns of our history; or
b) That are associated with the lives of persons significant in our past; or
c) That embody the distinctive characteristics of a type, period, or method of construction, or that represent the work of a master, or that possess high artistic values, or that represent a significant and distinguishable entity whose components may lack individual distinction; or
d) That have yielded, or may be likely to yield, information important in prehistory or history.

Source: Code of Federal Regulations, Title 36, Part 60.

listed for architectural value, and rock art may be listed for its artistic as well as information value.

The language of the criteria sounds straightforward but also is quite general. In their introduction to a collection of articles on assessing archaeological significance of historic sites, Lees and Noble (1990: 10) assert that the "National Register criteria, as almost everyone agrees, are woefully inadequate for providing a workable definition of site significance." The major problems Lees and Noble identify as subjective, biased, and inconsistent approaches to historic sites in survey, evaluation, and treatment may be inherent in a set of criteria flexible enough to be used for all types of properties throughout the country. As one solution, they promote the idea of context, which has actually long been essential to the National Register evaluation process. Over the years, there have been calls for more explicit significance criteria (for example, Raab and Klinger 1977; King 1978; King and Lyneis 1978; and others in Briuer and Mathers 1996: III b1; see also Briuer and Mathers 1996: III b8). No such calls, however, have offered evaluation schemes that are regionally or nationally applicable (Briuer and Mathers 1996: 12). There have also been those who have argued that the criteria are adequate (for example, Sharrock and Grayson 1979; Barnes et al. 1980; Wendorf 1980; LeBlanc 1983; and see Briuer and Mathers 1996: III b8).

The actual application of the criteria has developed over the thirty-plus years that they have been in place and used by state historic preservation officers and federal preservation officers. Guidance from the keeper of the National Regis-

ter is currently provided in a series of National Register Bulletins, many of which are available over the Internet at http://www.cr.nps.gov/nr/publications/bulletins.htm.

An assumption embedded in the criterion of important information is that information is the only reason that archaeological sites may be worthy of preservation. The single-minded focus on information ignores other values that the public sees in archaeology, including associative, educational, aesthetic, nationalistic, and economic (such as in the form of tourism draws) values. We ought not to ignore these other values of sites, unless we are committed to archaeology being for archaeologists only (Lipe 1984; Moratto and Kelly 1978).

The National Register significance of archaeological sites is a narrow concept that does not encompass the ways in which various publics perceive and use archaeology. It is also quite different from the significance assumed to be attached to other kinds of properties acknowledged by the national preservation program.

For a property to be listed, it need meet only one criterion. In spite of the general way in which the criteria are written, they often are interpreted in such a way that no more than one criterion is applied. King (1998: 77) comments on the apparent illogic of this practice: "Arguably, though, to be eligible under Criterion D a place must also be eligible under Criterion A. How can a place have important information about the past if it's not associated with some sort of important pattern of events?" The keeper, who manages the National Register, has responded in public meetings to such statements by making the point that the criteria have been kept separate and applied separately so that they maintain their distinctiveness. Otherwise, it would indeed be difficult to use any criterion without including criterion a (C. Shull, personal communication). In spite of this long effort to keep the criteria separate, the trend has been changing, particularly with regard to archaeological properties. In the past several years, the keeper has frequently stated that archaeological properties may be eligible under more criteria than just criterion d. In practice, however, this application has been difficult to achieve, particularly because of the requirement that a property eligible under criteria a, b, or c must have a demonstrated ability to convey its significance, while a property eligible under criterion d is required to have only a demonstrated potential to yield important information. Conveying significance is usually interpreted in terms of aboveground, visible remains that are readily apparent to a member of the general public. I drafted the revised National Register Bulletin on evaluating and registering archaeological properties to make the appropriate application of all criteria to archaeological properties a little more transparent (Little et al. 2000).

The evaluation criteria for the National Register are used not only for formal listing but also for the daily work of CRM. Defining the research potential, and increasingly other values, of archaeological sites and districts according to these

criteria has affected the way the public and the profession regards the significance of archaeology.

Criterion d's specification that the archaeological information be "important" makes the assumption that we know what the important questions are now and what they will be in the future. Problems arise, of course, when the future brings new methods, new questions, new types of archaeology, and the need to reexamine old conclusions. If we are honest, we cannot predict either what we will want to know or what we will value in the future. Peacock (1996: 42) summarizes the problem this way: "Debates concerning significance in archaeology have helped establish the problem-oriented research design as the major way in which CRM projects are structured. The major drawback of this approach is that it fails to insure the survival of an archaeological database for future research needs."

Therefore, while the National Register criteria are firmly entrenched in CRM and are broadly applied, they are also widely resisted, as many archaeologists perceive that applying current research values to sites may unintentionally impair future research because judgments about significance change over time. Some federal agencies and states have created the category "potentially eligible" for sites. Peacock (1996: 42) writes, "Potentially significant sites located on federal lands should not be evaluated unless absolutely necessary, but set aside for preservation and research needs." The idea behind this unofficial category is to allow managers to take sites into account when planning without tying a site's fate to current questions. Whether sites and districts actually are preserved more effectively with or without formal evaluation is an open question, the answer to which may rest in the management practices of particular agencies.

There is a disconnection between the use of the National Register criteria under the Section 106 process and the formal listing of properties that reflects the dual role of the National Register, a split that Tom King (1998: 93) emphasizes by insisting that "eligibility determination and nomination are *completely different things*." He sees a listing in the National Register as useful only as an honorary designation, not in the planning process. He writes (1998: 95): "In a rational world, the Register would be an honorific tool and we'd use other, simpler, cheaper, more flexible tools for planning purposes. . . . We struggle along trying to use the Register, and its eligibility criteria, for both honorific and planning purposes."

The National Register, archaeology, and the national memory

Archaeological properties, which are almost exclusively nominated under criterion d, are underrepresented because they make up only about 7 percent of more than 72,000 listings, whereas more than 80 percent of the listings are for architectural significance. A higher percentage, about 10 percent, of more than 2,000 NHLs are archaeological. Does it matter that archaeological sites are under-

represented? The National Register is of two minds: one commemorates history and the other reserves scientific information for future retrieval. The first is concerned with association, feeling, and connection with the past, with heritage, with the creation of a national identity. This part is primarily architectural and overwhelmingly non-Native American. The other, which uses criterion d, is largely archaeological.

The introductory materials to early editions of the National Register book provide little context of how the list might be used or perceived, although the bicentennial edition applauds the evolution of historic preservation from elitism to expanded representation. It is not until the latest edition published in 1994 (which I believe is the tenth edition) that the anonymous authors (NPS 1994: viii and ix) of the introduction write that a listing in the National Register:

> has meaning that far transcends an honor roll of significant places. . . . National Register documentation of historic properties becomes part of a national database and research resource available for planning, management, research, education, and interpretation. Listing furnishes authentication of the worth of a historic place and often influences a community's attitude toward its heritage.

Perhaps the final point is most important: listing in the register serves to authenticate the worth of a historic place. It is this authentication that gives the register power in public perception. The preamble to the 1966 NHPA states: "The historical and cultural foundations of the Nation should be preserved as a living part of our community life and development in order to give a sense of orientation to the American people." I think that the implication is clear that the list of significant places is meant to be representative of American history. It strikes me that archaeological resources might account for more than 7 percent of actual historic places and should have a higher representation on this official list. I do not claim to know what an ideal proportion might be, but consider that history before European exploration and settlement lasted at least twenty times as long as history after that settlement began. The dearth of archaeological listings results in a deafening silence: a gap in the national memory.

The National Register and the National Historic Landmark program play an important role in influencing public perceptions (and policy decisions) about what is significant in American history. The connection between the public nature of archaeology and the public nature of the National Register, especially as it is now perceived and presented, is the key to addressing the question of why it matters that archaeological sites are underrepresented on the national lists.

Archaeologists working in this country today are aware that the "public" has become exceptionally important to archaeology: we are anxious to educate the public, to share the excitement and discoveries of the discipline; we are eager to point out the public benefits of our discipline, to reveal the wrongheadedness of those who would profit from the plunder of sites and the sales of artifacts; we

want to protect archaeological resources and the legislation which addresses them; and we want the public's help in doing so. We have been quite successful at enlisting the public's support. But we are not using an important tool at our disposal. I have become convinced that archaeologists undervalue and underuse the National Register, which has become an essential component of the public memory. In considering public memory when discussing the National Register, I am speaking less of content than of form. In some ways, the medium itself is an essential message of the National Register.

I believe that it is relatively recently that the Register has taken on a role as an essential component of public memory in the United States. I think that part of the reason it has done so is that it is now available as a searchable and useable database. Only in the past decade has the database been computerized, and statistics can now be more easily compiled and interpreted.

Until U.S. citizens see the "prehistory" of their country as important to their identity as Americans and as valuable to their sense of belonging in the land, the "us versus them" relationship between indigenous and immigrant peoples will remain unresolved. In addition, public attention to the conservation of archaeological sites will be sporadic at best and given only to sites perceived as spectacular. Peter Fowler (1981: 67) writes that, for the public, a few generations are easier to understand than the distant past. Most people's sense of the past probably does not extend beyond a few generations. Therefore, he argues, archaeology's single most important contribution to society may be a sense of perspective in time. Archaeology, therefore, extends the past deeply. It may counter the modern cognitive time line, which compresses 500 generations into a single word: "prehistory." I do not mean to confine archaeology to indigenous sites alone; also missing from the register is a fair representation of sites of the nonelite, whose buildings and structures have not been carefully curated: African Americans, Chinese Americans, the poor of many ethnicities, and the laboring class.

In his book *Silencing the Past,* anthropologist Michel-Rolph Trouillot analyzes some ways that historical narratives silence certain aspects of the past. He writes:

> Silences enter the process of historical production at four crucial moments: the moment of fact creation (the making of *sources*); the moment of fact assembly (the making of *archives*); the moment of fact retrieval (the making of *narratives*); and the moment of retrospective significance (the making of *history* in the final instance) [emphases in original]. (Trouillot 1995: 26)

Silences may enter into historic preservation at several of these moments, but particularly at the moment of preserving an archive of our physical surroundings. The National Register, as an official list, is both an archive and a collection of narratives. It has added power to the promotion of the preservation of selected

places. Its silences therefore are compounded when histories are compiled without those building blocks which have been judged worthy or unworthy of preservation.

I suggest that archaeologists have the opportunity to contribute to the "official" public memory and to add many silenced voices to that memory. Archaeologists can nominate sites as a way to confront the silencing of an important part of the past. Archaeological sites listed and therefore acknowledged as "places important in American history" would then be available to contribute to the creation of public memory (Little 1997).

Conclusion

So, where are we with the National Register of Historic Places? We have a process through which many sites that are eligible for listing in the National Register are not listed but are treated either by avoidance or by mitigation through data recovery. Until recently, this system has worked fairly well, at least from the point of view of archaeologists, but it is a process which incompletely considers the public benefit of archaeological sites to the nation's sense of itself. The problem-oriented approach narrows the significance of archaeological properties, inadvertently restricts the future of inquiry, and supports a data-gathering industry resistant to synthesis. The underrepresentation of archaeological sites hinders our attempts to raise public awareness and promote the public benefits of archaeology.

Does this assessment sound hopeless? I don't mean that it should. The criteria are actually quite flexible as they are written, and the formats for nominating and listing sites are flexible as well. I believe that the tool is in place, although it must be used creatively to get us where we want to be. I am most interested in working toward a register that lists archaeological sites in proportion to their importance to the history of the land of the United States. As an archaeologist, I want that to happen because I am vitally interested in public education and public memory. I propose that my colleagues should be vitally interested in countering the silences that currently fill the archaeological gap in the National Register of Historic Places.

It is important to use the National Register so that it will be used for public archaeology. Archaeologists should be able to justify significance and to clarify why we value the sites that we value so that the general public, legislators and journalists do not flounder or have to guess the significance of archaeological properties to the nation's history.

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8

Reassessing archaeological significance

Heritage of value and archaeology of renown in Brazil

Pedro Paulo A. Funari

Introduction: Words and definitions

Notions of "value," "importance," "significance," and "renown" are in general use in both archaeological resource management and public archaeology (see Darvill, chapter 2); however, there is still a great deal of discussion about the precise meaning of these terms. It is interesting to note that none of these words are of Anglo-Saxon origin, as they are indeed medieval French loan words, of only indirect Latin ancestry, as is the case with approximately half the English language vocabulary (Potter 1950: 36). French expressions have more ethereal and less down-to-earth connotations and associations, so they naturally are particularly open to specialized and perhaps abstruse usage. Although of Latin origin, the Romans did not use words related to these French terms; they used *pretium* (price) or *uirtus* (courage) for value, *grauitas* (dignity) or *auctoritas* (rank) for importance, *efficientia* (influence) for significance, and *fama* (the voice of the many, fame) for renown. The nobility, both ecclesiastical and lay, introduced the elite French terminology, which lasted for 300 years alongside the "ordinary" English speakers. This elitism is exemplified by the chronicler, Robert of Gloucester, who wrote that, "unless a man know French, one counts of him little" (Potter 1950: 35) The language of this "superior" social class naturally conveyed an elitist *Weltanschauung,* a concept concerning high society and the life style of a minority.

Value, in the first instance, means "the monetary worth of a thing" and, by extension, "that which is worthy of esteem for its own sake," precisely the opposite of the market value of something. This ambiguity explains recent discussions concerning the possibility of measuring heritage value, because sometimes heritage material culture has a value in the marketplace (see Grenville and Ritchie, chapter 12), especially elite, high-style buildings, works of art, and the like, while

the more "humble" remains of ordinary people are tossed away even by cultural research managers (see Tainter and Bagley, chapter 4). In this context, some scholars would prefer to split the two meanings of "value," as they indeed are contradictory; something cannot at the same time attain a price and have worth for its own sake. "The archaeological heritage has nothing to do with financial quantification, or with productive use however defined" (see Carman, chapter 3). "Significance," "importance," and "renown" are terms whose medieval origins betray their upper-crust context, as they were originally meant to express the importance of people and things as recognized by the nobility. As is noted in the King James Bible, "the . . . mighty men which in old [times were] men of renown" (Gen. 6:4). The two aspects of these concepts are thus market value on the one hand and subjective social value on the other. There is tension between these two types of value, but there is even more contention about the social value attached to material culture. At least three forces are trying to define the importance and significance of the material world: the state (through legislation), the community (a rather imprecise term that refers to a host of heterogeneous groups and interests), and archaeological scholarship (see Grenville and Ritchie, chapter 12).

In many countries, it is not illegal to deal openly in artifacts that have been obtained through illicit excavation, or which have been smuggled out of their country of origin. The trade in illicit antiquities may reach an astonishing two billion U.S. dollars annually (Brodie 1998: 1–2). It does not help matters when the occasional professional archaeologist encourages this trade by opening his own "antique" shop (for a Brazilian example, see Funari 1998: 44). The marketplace also contributes to this trade by dealing in artifacts acquired through theft, war, and colonial exploitation (Economist 1997), further complicating the picture. The state as an agent of heritage evaluation is in fact composed of a variety of institutions, from world organizations such as UNESCO to national and local (state and municipal) legislatures. The basic criterion of the 1972 UNESCO World Heritage Convention, "outstanding universal value," has been useful for providing legal protection to numerous sites, but it fails to take into account non-European, nonelite, and indigenous contexts, for ordinary people's concerns and values are undervalued (Cleere 1998). National, state, and municipal legislation and legislated heritage registers have become more numerous during the last decade (see Little, chapter 7), but "ordinary" heritage is still often ignored (for example, Kamide and Rodrigues 1998), contributing to the popular misperception that only spectacular sites are worth preserving (see Little, chapter 7). Nevertheless, local laws enacted to protect cultural heritage may serve as instruments to register sites and to protect them (for example, Pernisa Júnior 1998 on Juiz de Fora, a city in Brazil).

The community comprises local inhabitants, indigenous peoples, and elite groups, among a host of many other interest groups. The diversity of values attached to different cultural properties by different groups cannot be underestimated (see McGuire and Walker 1999), as the value of a heritage property is not

inherent and immutable, nor linearly related to size, depth, and material content (see Tainter and Bagley, chapter 4). This diversity also implies that any hierarchy of values, whatever its practical justification, is perceived by the different interested groups as a decision imposed by a distant scholar. Precisely for this reason, a heterarchical model of significance has been proposed of late (see Mathers et al., chapter 10). Archaeological scholarship thus has a pivotal role in defining what matters and in prioritizing the scientific access to sites over that of the general public and indigenous peoples by invoking the use of scientific discourse (see Smith, chapter 5). The limited assessment criteria often used by scholars do not take into account nonscientific, social demands (see Mathers et al., chapter 10); sometimes these criteria are not even explicit (Darvill and Mathers 1997) or available to the community at large. Community involvement is essential if the concerns of scholars are to be taken seriously by the laity; for example, there are numerous instances of people volunteering their time and effort to the restoration of ancient buildings (for example, Januzzi 1998).

It is in this context that in this chapter I address the values associated with material culture and archaeological preservation in Brazil by discussing the economic, social, political, and ideological issues at stake. Brazil, a huge state in South America, has a population of more than 160 million people, and is one of the ten largest economic powers, in terms of its gross national product (GNP), and at the same time, it is one of the most unequal societies in the world. Its history has been one of secular exploitation, patriarchalism and patronage, and violence rather than of civil peace (Batista 1995). Authoritarian government has been the rule, and freedom from economic exploitation and social dependence the exception. Rita Camata (1998), a liberal representative in the Brazilian Chamber of Deputies, has noted a societal split so vast that the "elite fascists," which represent 1 percent of the population, earn 14.6 percent of the country's income, whereas at the lower end of the scale, approximately 800 children die every day, stricken by hunger and disease, or at the hands of death squads. Values in such a society are thus split even more along class lines and between ethnic groups and other interests than elsewhere. In this chapter, therefore, I attempt to explore some intricacies of the Brazilian case.

Heritage in Brazil: History, features, and outlook

Several scholars have been studying the intrinsic features of Brazilian society, astonished as we always are, by the apparent contradictions of such an odd social structure. Brazil has witnessed more than 300 years of absolutist Portuguese rule, its inhabitants being vassals rather than citizens, living in a rigid hierarchical system (Velho 1996). Independence in 1822 perpetuated this system with the continuation of dynastic rule up to 1889, and the *aggiornamento* of the republic did not change the *arcana* of social power: people in power rule, others obey, as privilege and patronage are pervasive (Chauí 1992). The private will of elite

families is often assumed as public policy (Schwartz 1997), and personal subordination is a feature of the national character (Schwarz 1988a: 16). The sphere of the public, or *Öffentlichkeit,* to use Habermas's definition of the common interest (Habermas 1978), is considered by the authorities as *cosa nostra,* loyalty being a key word to define a society based on privilege (Da Matta 1991: 4). Patronage is so strong that opposing it is almost like being a foreigner in one's own country (Schwartz 1988b; Graham 1995; Toledo 1996; for an example in archaeology, see Funari 1997).

In this context, it is natural that the earliest document relating to the official protection of archaeological heritage in Portugal, which dates to the eighteenth century, tries to protect "any old building, statue, inscription in Phoenician, Greek, Latin, Gothic or Arabic, as well as coins" (Andrade 1987: 66), was not applicable for use in the Portuguese colony in South America. During the nineteenth century, despite the attention paid by the court to scholarship in general and the foundation of the Historical and Geographical Institute, no law on the subject was enacted. Museum officials, as well as amateurs and other interested individuals, often collected and registered archaeological artifacts (for example, Prous 1992; Martín 1997; Funari 1999). In the beginning of the twentieth century, the earliest proposal of legislation protecting archaeological remains, never approved by the Congress, was written by Alberto Childe, the Keeper of Classical Antiquities of the National Museum, Rio de Janeiro (Silva 1996). Childe states that "remains, buildings, caves, cemeteries, shell middens are to be considered national assets and owned exclusively by each state of the Union" (Silva 1996: 11). During the 1920s and early 1930s, other proposals were also written, but not approved.

In 1936, Mário de Andrade, a leading intellectual from the State of São Paulo, prepared a draft bill protecting cultural assets that was discussed by representatives in the Congress and very nearly approved when there was a coup d'état by the president himself, Getúlio Vargas. President Vargas, who had supported the law during as Minister for Education, published the bill soon afterwards as a decree (decree number 25, dated November 30, 1937), and from 1940 the National Artistic and Historic Heritage Service began to register and protect archaeological sites and collections. However, most cultural properties continued outside the protection of the decree (Andrade 1952: 66). Another leading intellectual, Paulo Duarte, was to become the main fighter for heritage protection in Brazil. Duarte, a liberal who fought for the creation of the first university in Brazil, the University of São Paulo, in the early 1930s, lived in exile during the dictatorship of Vargas (1937–1945). Upon returning to the country, he brought with him the idea of initiating the scholarly study of prehistory. Duarte had been influenced by French humanism, and his friendship with Paul Rivet and his admiration of the *Musée de l' Homme* in Paris led him to propose the establishment of the Prehistory Commission in São Paulo, later renamed the Prehistory Institute (Duarte 1967, 1994, 1996).

Duarte was very active in the years of democracy in Brazil (1945–1964), organizing a series of initiatives for the development of archaeology and heritage protection. A bill protecting archaeological sites was finally approved by the Congress in 1961 (Law number 3924); this law the first comprehensive law regulating the protection of archaeological remains (Souza Filho 1997: 54). While the decree of 1937 was intended to protect "those assets linked to the memorable facts of Brazilian history and those of exceptionable value" (for the first article, see Pinheiro da Silva 1996: 20), the law of 1961 was much broader in its scope, referring to "whatever archaeological or prehistoric monument" (for the first article, see Pinheiro da Silva 1996: 20). Consequently, archaeological sites are now protected immediately *ex ui legis* (by law) (Castro 1991: 106). A military dictatorship was established with a coup d'état in 1964, and the humanist approach to the past, so clearly expressed in efforts to preserve a "humble" shell midden against developers, for example, was first sidelined and later opposed by the authorities. Betty Meggers and Clifford Evans, two American archaeologists who had worked since the 1940s in Brazil (Roosevelt 1991: 106), used the opportunity offered by the new authoritarian regime in Brazil to set up, soon after the coup, a large archaeological survey project, known as Pronapa (National Program of Archaeological Research). The program trained several Brazilian archaeologists, and the Americans worked in close cooperation with the military authorities.

As Pronapa increased its influence, the military authorities hindered humanist archaeology and its preoccupation with heritage protection. Duarte himself was expelled from the University in 1969; others left the country, while those remaining continued low-profile careers. Pronapa resulted in several field seasons being conducted throughout the country, though with very few published reports, and heritage management was usually not even considered by the field workers. During the heyday of military rule, official heritage institutions were left on the sidelines, as the regime was based on a reactionary, antihumanist cultural policy, compounded by a drive for development, which gave rise to the destruction of protected heritage sites, notably shell middens. This picture was blurred by the actions of individuals, within or outside heritage institutions, as there have always been people fighting for the preservation of such "humble" remains. A case in point is Joinville in Santa Catarina state, the only shell midden museum in the country, which was inaugurated during the height of military rule but whose collection of artifacts originated in earlier archaeological work (Tamanini 1999). Another notable example is the Institute of Prehistory, founded by Duarte and almost destroyed in the wake of his expulsion in 1969, whose heritage section later dealt with the educational aspects of social consumption of cultural assets (Bruno 1996).

The restoration of civilian rule in 1985 led to the blossoming of a variety of new practices and standpoints, free from the oppressive shadow of the hard days of the dictatorship. The archaeological establishment, born during the authori-

tarian period and under its influence, tended to continue impervious to change, but as time went by, more and more archaeologists began to distance themselves from the isolationist approach that had prevailed during the military years. The dialogue between archaeologists and other scholars, anthropologists and historians in the first place, led to a growing awareness of the social implications of archaeological work. Furthermore, heritage institutions, already active in the previous period, changed their character in the new democratic framework from bureaucratic branches of a military dictatorship to institutions responsible, in a way, not only to the state but also to the people, and became again a political player. Archaeological monuments would thus be able to play an active role in exposing social tensions and contradictions, in the wake of Herrmann's somewhat earlier comment, that "*archäologische Denkmäler enthalten die Wiedersprüche ihrer jeweiligen Entstehungszeit,*" which translated means "archaeological monuments contain the contradictions of their original conditions" (Herrmann 1981: 27; cf. Funari 1988).

To heritage officials, accountability meant that the interests of different social groups should be within the horizon of heritage management. The devolution of power to states and towns also led to the sprouting of municipal and state heritage institutions and legislation. Brazilian Heritage, the federal agency founded by the Union government in the nationalist period before World War II, had been complemented by some state heritage institutions, but they were almost exclusively concerned with high style and outstanding monuments. The new winds of freedom led to the introduction of new concerns in established institutions, such as the São Paulo State Heritage (Condephaat), and to the multiplication of municipal heritage institutions throughout the country. In the same vein, town councils and state assemblies passed laws regarding the protection of heritage, whose application accounted for the direct participation of heritage institutions in the supervision of fieldwork by archaeologists. Another notable move came with the introduction of federal legislation regarding the mandatory archaeological survey and rescue of areas affected by major development projects, within both urban and rural contexts. In the wake of this legislation, archaeological fieldwork had to be linked, at least in theory, to some kind of heritage management supervision and cooperation.

Increasingly, people recognized that archaeological knowledge is not neutral or apolitical by virtue of its very nature as a human endeavor (Veit 1989: 50) and that archaeological work should result in a motivation for the development of critical thought (Vargas and Sanoja 1990: 53). The observation that archaeologists produce evidence to be changed into knowledge, "*sein Wissen ist—wie noch Kant sag—cognitio ex datis*" (Kittsteiner 1997: 6), has also been acknowledged in Brazil through the ironic but realist words of a senior French archaeologist (who has worked in Brazil since the 1960s), "*tout ce que l'ont fait ou trouve est nouveau . . . ce qui n'encourage ni à l'autocritique, ni à fuir la routine*" (Prous 1994: 11). In other words, the introduction of laws protecting heritage, the

sprouting of heritage institutions themselves, and the growing field activities are not necessarily conducive to creative and socially engaged practices, even though the newly found liberty led to the emergence of a variety of situations.

Archaeology of renown is still very strong in the sense that at least some leading conservative institutions continue to propose the display of elite material culture and the maintenance of mythical discourses about the past. A case in point is the Paulista Museum, whose main task continues to be to protect elite tradition (Funari 1991, 1994, 1995). Constructed in the late nineteenth century as a huge memorial monument celebrating the country's independence, it is used to reinforce in the popular mind a mystic and imaginary history that justifies social inequalities and social exclusions. Instead of demystifying archaeology and teaching about how a past is constructed (for example, Leone et al. 1987: 285), the Paulista Museum's overt purpose is to reinforce and exemplify its function as a civic cathedral, which consequently alienates ordinary people (for a conservative defense of this approach see Meneses 1991: 5; compare Oliveira 1998). Conversely, the same alienation explains the lack of concern, by the same ordinary people as well as by the elite, about the plundering of heritage in general and, notably, of high-style artifacts. Recently, the masterpieces of Aleijadinho, an eighteenth-century Brazilian artist, have been sold at auction at Christie's. In a single day, almost $10 million worth of Brazilian works of art were sold (Blanco 1998). As a side effect, theft from church buildings and museums is widespread (Rocha 1997).

In the recent past, there has been an increasing awareness that high-style architecture and art are part of the people's heritage; consequently, government authorities and nongovernmental organizations have been active throughout the country trying to prevent their decay and to foster the active participation of the community in the preservation and social use of heritage. The Coffee Stock Exchange Building in Santos, a 1920s building in a large port town, for example, has recently been restored by the São Paulo State government and converted to the Museum of Brazilian Coffee (Rodrigues 1998). When official institutions and nonprofit civic organizations unite, it is easier to propose the preservation and actual pedagogic use of historic buildings. Thus, the fight against the decay of colonial towns in Minas Gerais state (Sebastião 1998a), including Itaverava, Itabirito, and Conceição do Mato Dentro alongside the more famous Ouro Preto, Diamantina, and Tiradentes (Sebastião 1998b), has received much attention. Even though the majority of historic buildings still remain in poor condition (for example, Verzignasse 1998; Werneck 1998), the active involvement of the people has been essential to the successes (for example, Leal 1998). In the last few years, there has been a resurgence of interest in historic heritage, with restorations of downtown areas in Salvador, Recife, Rio de Janeiro, and São Paulo (Masson 1998) as well as in several smaller towns from Belo Horizonte (Campos 1998) to Campinas (Magnusson 1998; Santos 1998).

The "humble" prehistoric archaeological artifacts suffer from the lack of

identification of Brazilians with this heritage, which is sometimes deemed foreign to the national identity. However, the struggle "for a more equal world" (Bruno 1991: 3) implies the recognition of the importance of the preservation and pedagogic use of even such humble remains. Following Paulo Duarte's lead (Mindlin 1991; Uchôa 1991), several museums and local displays (for example, Cruz 1997) have since been paying attention to prehistoric sites and artifacts. Another important feature of the recent past is the search for the victims of oppression, especially the archaeological evidence for mass graves relating to missing people. Ivan Cáceres, a Chilean archaeologist, has emphasized that archaeological work in other Latin American countries, most notably in Argentina, Chile, and Guatemala, has led to a change in the "whole perspective of a society that was taught to forget about these crimes" (quoted in Padgett 1992: 8; compare Masland and Padgett 1993). In Brazil, the recent authoritarian period is still a taboo subject, but the humanist approach indicates that the community is increasingly aware of the importance of remembering the past.

The way forward?

The way ahead is fraught with obstacles, but humanism is now an option for scholars and the general public alike. Museums are beginning to incorporate research projects investigating the social history evidenced by the contexts in which artifacts were made and used (Hall 1993: 181). There is also a growing awareness of the political and ethical responsibility of empowerment, which affords more diverse groups of people access to archaeological remains (Shanks 1995: 54). The time is coming for archaeologists to engage in dialogue with society, especially its ordinary groups, such as working people and Indians (McGuire and Walker 1999). The values of different social strata must be included in the horizons of archaeologists, and actual collaboration between scholars and the laity is finally taking shape. Values are now being interpreted in a much broader sense, taking into account several social strata and their interests. It is no mean task to meet the new demands of society, but Brazilian archaeology is facing its new daunting tasks with fresh enthusiasm.

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9

Plastic value

Archaeological significance in South Africa

Gavin Whitelaw

Introduction

In this paper, I examine the concept of archaeological site significance in South Africa, with a focus on the province of KwaZulu-Natal. Unless stated otherwise, I use the term "archaeological" to refer to sites predating A.D. 1840 associated with the indigenous people of South Africa. I begin with an outline of past heritage legislation in South Africa, which has provided the background to current perceptions of archaeological significance. Then I turn briefly to current legislation and the future.

Background

A. C. Haddon, president of Section H of the British Association for the Advancement of Science, indicated the need for legislation to protect archaeological sites during his visit to South Africa in 1905 (Deacon 1990). Legislation followed six years later, prompted by concern at the destruction of San paintings, engravings, and artifacts, and their export from South Africa. To a large extent, this legislation was the result of a campaign by the South African National Society (SANS), a pressure group founded in 1905 concerned with the conservation of the country's natural, cultural, and scientific heritage (Deacon and Pistorius 1996). This legislation, the Bushman-Relics Protection Act (No. 22 of 1911), defined Bushman relics as (Section 1):

> any drawing or painting on stone or petroglyph of the kind commonly known or believed to have been executed by the South African Bushmen or other aboriginals, and shall include any of the anthropological contents of the graves, caves, rock shelters, middens or shell mounds of such Bushmen or other aboriginals.

The act made no provision for the protection of any other type of site. Nor did it provide for the establishment of a body responsible for the protection.

Not satisfied, the SANS continued to apply pressure on the government, leading to the promulgation of the Natural and Historical Monuments Act in 1923 (No. 6), which operated in tandem with the Bushmen-Relics Protection Act. The new act made provision for the creation of a body which was required, among other things, to make a register of monuments that in its opinion "ought to be preserved" (Section 4). Monuments were defined as including (Section 8):

> areas of land having distinctive or beautiful scenery, areas with a distinctive, beautiful or interesting content of flora or fauna, and objects (whether natural or constructed by human agency) of aesthetic, historical or scientific value, or interest, and also specifically includes in any event and without limiting the generality of the previous portion of this definition, waterfalls, caves, Bushmen paintings, avenues of trees, old trees and old buildings.

These acts together provided legal protection to archaeological sites and their contents, though with a distinct hunter-gatherer ("Bushman") flavor. This is not surprising as archaeologists at the time were concerned primarily with the hunter-gatherer past and had not yet recognized the significance and time-depth of the agricultural sequence in South Africa. Since all archaeological residues were considered equal, as "monuments" or "Bushman-relics," there was no need to delve into the issue of site significance.

The longer Preservation of Natural and Historical Monuments, Relics and Antiques Act (No. 4 of 1934) replaced both earlier pieces of legislation. In contrast to the all-encompassing definition of monuments in the 1923 act, the term "monuments" in the 1934 act was restricted to sites formally proclaimed as such and which, as a result of the proclamation, received special legal protection. The act in its original form provided no protection whatsoever to any site or object not proclaimed a monument, relic, or antique. This flaw was quickly recognized, and in a 1937 amendment, protection was extended to all drawings, paintings, and petroglyphs, and their immediate surrounds, associated with people who "inhabited or visited South Africa before the advent of the Europeans" (Section 8.b); as well as to graves, caves, rock shelters, middens, and shell mounds used by them. This amendment effectively encompassed all archaeological sites of a precolonial nature, though again the language had a hunter-gatherer flavor.

The 1937 amendments have since determined the character of archaeological heritage management in South Africa. An early burst of activity, during which several archaeological sites were proclaimed monuments, was followed by a long period during which the proportion of precolonial monuments declined from 14 percent of the total in 1948 to 2 percent in 1991 (Deacon 1993a, 1993b). The reason for the decline was a decision taken in the 1940s by the Historical Monuments Commission (HMC; more correctly, the Commission for the Preservation

of Natural and Historical Monuments, Relics and Antiques) not to proclaim archaeological monuments except in unusual circumstances, because the sites already received blanket protection under the act. The HMC thus relieved itself of the task of defining archaeological significance, other than in the very broad terms of the act. The legislation simply protected all sites and allowed the HMC to regulate the excavation, removal, or export of archaeological material through the establishment of a permit system (Sections 11.d and e and 13.1.d; 1937 amendments).

The 1934 act was replaced by the National Monuments Act (No. 28 of 1969), which was in turn replaced by the National Heritage Resources Act (No. 25 of 1999) on April 1, 2000. After several amendments, the National Monuments Act also provided blanket protection to archaeological sites and retained the permit system (Section 12, 2A):

> No person shall destroy, damage, excavate, alter, remove from its original site or export from the Republic:
>
> (a) any meteorite or fossil; or
> (b) any drawing or painting on stone or petroglyph known or commonly believed to have been executed by Bushmen; or
> (c) any drawing or painting on stone or petroglyph known or commonly believed to have been executed by any other people who inhabited or visited the Republic before the settlement of the Europeans at the Cape; or
> (d) any implement, ornament or structure known or commonly believed to have been made, used or erected by people referred to in paragraphs (b) or (c); or
> (e) the anthropological or archaeological contents of graves, caves, rock shelters, middens, shell mounds or other sites used by such people; or
> (f) any other historical site, archaeological or palaeontological finds, material or object,
>
> except under the authority of and in accordance with a permit issued under this section.

Other than blanket protection, the National Monuments Council (NMC), which replaced the HMC, could protect archaeological sites in three ways. Greatest legal protection was provided by declaring a site a national monument. The NMC could also declare provisional national monuments, a strategy which it sometimes used to buy time in the case of sites facing an immediate threat. Second, the NMC could list sites on the National Register, in consultation with local authorities, which brought the NMC into local town-planning decisions that potentially affected the site. Finally, the NMC could designate conservation areas of special historic, aesthetic, or scientific interest. Few archaeological conserva-

tion areas were declared, though I believe there was potential for greater use of this option. Independently of the NMC, some local planning authorities "listed" heritage sites, thus providing protection through planning incentives and a stringent application of the National Building Regulations. This system of listing was sometimes poorly integrated with NMC strategies. To my knowledge, no archaeological sites were listed by local authorities or placed on the NMC's National Register.

It is worth noting that where earlier legislation referred simply to "monuments," the monuments declared in terms of the National Monuments Act were "national monuments." This change had considerable implications, raising the question of what exactly is meant by "national," particularly in a country as divided and culturally diverse as South Africa and one with such a deep and varied archaeological record. The term emphasized the political nature of monument proclamation. Section 10.1 of the Act stated:

> Whenever the Minister considers it to be in the national interest that any immovable or moveable property of aesthetic, historical or scientific value or interest be preserved, protected and maintained he may . . . on the recommendation of the council . . . declare any such property . . . to be a national monument.

Clearly, some monuments recently declared, such as John Dube House (Dube was first president of the South African Native Congress, subsequently the African National Congress) or the Passive Resistance Site in Durban (where the Indian Congress movement launched the Passive Resistance Campaign of 1946–1948), would not have been considered as being "in the national interest" during the apartheid era, however persuasively the NMC might have motivated their declaration to the Minister. Their declaration now is part of the process of creating a new past, one that acknowledges the oppression of past South African society.

Archaeological interests would perhaps have been less affected by the political implications of the act because, in an empiricist way, they are frequently considered "scientific" and therefore independent of society. In any event, the issue was rarely broached because by the time the act was in place, the principle of not declaring archaeological monuments was well entrenched. With respect to other interests, the generality of the criteria for monuments allowed for the creation of a diverse suite of monuments other than those that represented opposition to the state, whether or not those monuments had a national character, whatever that might be. A Claim Your Heritage project, launched in September 1998, provides an example: the NMC married national and local interests by inviting the public to honor democracy (a national interest) by nominating sites "you consider to be of cultural significance in your community. [These] might include the homesteads of our leaders, or founders of democracy, or sites where historic events occurred,

or places where people gathered to discuss community affairs" (NMC poster 1998).

Archaeological significance: Research and cultural resource management

A consequence of the nondeclaration policy was that archaeological significance was defined solely by research interests. As Carver (1996: 53, his emphasis) put it, "*Archaeological value* derives from the *character of the deposit* on the one hand and the *research agenda on the other*." The permit system through which the HMC and NMC managed activities affecting archaeological and historical sites therefore provides a partial record of archaeological significance in South Africa since 1937. The permit record excludes rock art research, unless that work involved the destruction of art or its removal from its original site. Other "non-destructive" forms of rock art fieldwork, even those that involved direct physical contact with the art (tracing, rubbing), did not require a permit (this is no longer the case in KwaZulu-Natal, which has its own provincial heritage legislation). Research that did not physically affect archaeological residues is also not recorded in permits allocated.

I do not wish to review that which research has made significant over the last century; histories of South African archaeology are available elsewhere (Deacon 1990; Hall 1990; Maggs 1993). In the field of cultural resource management (CRM), there has been limited formal discussion of archaeological significance, possibly because the formal practice of CRM does not have a long history in South Africa. Rescue or salvage archaeology, however, has been part of the discipline for many years. Environmental impact assessments and CRM were not legal requirements until the 1990s. Instead, early CRM depended upon the level of archaeological awareness within development agencies or on the relationship between specific developers and archaeologists. Some were more appreciative of archaeological concerns than others. The Department of Water Affairs, for example, in its various guises, developed considerable archaeological sensitivity with relatively little prompting by archaeologists and funded surveys and rescue excavations in several dam basins.

South African archaeologists began a concerted effort to organize CRM in 1988, prompted by coming environmental legislation that would make provision for environmental impact assessments. The process was managed through the Southern African Association of Archaeologists (SAAA), to which most practicing archaeologists in South Africa belong. By the end of 1989, the SAAA had produced a code of ethics, archaeological sites were protected by the National Monuments Act, while the Environment Conservation Act of 1989, which adopted a holistic view of the environment, provided the legal mandate for CRM within the framework of a planning philosophy called Integrated Environmental Management.

The Department of Environment Affairs took a strong interest in cultural resources, commissioning a study on the "problems, objectives, principles, and management models for cultural resource management." Some of the department's proposals were strongly opposed, in particular, for our purpose here, its definition of CRM as "the integrated application of management skills (such as planning, organizing, giving direction, control and evaluating) in a proactive manner in order to achieve objectives determined through the policy formulation process, with a view to ensuring the effective and efficient protection and responsible utilization of cultural resources for the benefit of all South Africans" (Coetzee et al. 1991: 3). Rather, archaeologists believed the term CRM should be restricted to the identification, evaluation, and treatment of cultural resources within areas in which development is proposed. This restricted definition is now widely accepted, though some archaeologists in South Africa may still prefer a broader definition (for example, Wahl et al. 1998).

In 1997, a "CRM Section" with its own admission criteria was established within the framework of the SAAA. Most archaeologists who either belong to the CRM Section or practice CRM adopt a pragmatic approach in accepting CRM as a compromise solution to the conflict that arises from the varying values (market versus community versus archaeological) that may be assigned to a property (see Carver 1996; Lipe 1984). For archaeologists, this approach involves making decisions about the relative significance of archaeological sites affected by planned development and the distribution of funds in the treatment of those sites. Huffman and Sievers (1996: 19) write: "A few [archaeologists] believe that all sites are of equal value and therefore all must be preserved. This view is theoretically untrue (the importance of data depends on relevance to a problem)." Some archaeologists might express concern at this position, but there is no published discussion or debate in South Africa that deals with the ethical and practical issue raised by such choices. In essence this concern is, how can archaeologists accept the destruction of archaeological sites simply because they are not relevant to a particular research problem, or, put another way, might sites marked for destruction not become significant in terms of future research problems? This, of course, is unknowable.

Research relevance links CRM to current research and determines the significance rating assigned to deposits of varying character. In recent years, it was a guiding factor in CRM projects at large dam sites in the province of KwaZulu-Natal, where the money available from the development agency allowed large-scale investigations of agricultural sites dating to the first millennium A.D. (Loubser 1993; van Schalkwyk 1994a, 1994b; van Schalkwyk et al. 1997; Whitelaw 1993, 1994). The project on which I worked in the late 1980s focused almost entirely on these sites, leaving many others to flooding without mitigation. This strategy (in a post hoc sense) could be seen as consistent with Carver's (1996) recommendation to target those sites with immediate research relevance (in other words, those with high significance) for archaeological investigation, and to

leave the rest conserved beneath the development. Carver's suggestion does provide an option: it is true that many archaeological deposits in the dam basin suffered no mechanical disturbance; the conservation of the remains might be improved in the stable anaerobic conditions at the bottom of the dam; and archaeologists of the future would have access to the deposits if the dam were drained one day (however unlikely). In most cases, however, I wonder whether the lack of widespread public support for archaeology in a world which applauds cost-effective delivery of material economic benefits might not prohibit this strategy in South Africa. Financial resources are already strained by efforts to deliver essential services to people who have none. Moreover, future implementation of the Development Facilitation Act, which is designed to expedite development, might suspend consideration of environmental (and archaeological) concerns, though in KwaZulu-Natal this has not happened yet (Rigby and Diab 2003).

The relationship between CRM and research was explored in a workshop held during the course of the 1998 SAAA biennial meeting. The product of the workshop was a list of types of sites regarded as worthy of mitigation if affected by development. It was stressed that the list would need updating on a regular basis as research priorities changed, but that it provided a "general rule-of-thumb for CRM practitioners who may not be fully conversant with the interests of archaeologists in specialist fields" (SAAA 1998: 5). The usefulness of the list is questionable, however, because it is so all-inclusive that it seems that the focus of the workshop attendants was on not leaving anything out, rather than on directing attention to key areas.

In South Africa, where much basic cultural history must still be done, it is the need to fill gaps in the archaeological record that frequently drives the selection of sites for mitigation. While CRM does generate new bodies of information, and point to new avenues of inquiry (for example, Anderson 2000; Huffman and Steel 1996; Maggs 1980; Maggs and Ward 1980), its product manifests itself partly as a growing volume of minimally curated, minimally analyzed archaeological material reported in documents that are not widely, nor always easily, available. For Carver, protected sites (monuments) are "simply a redundant pile of yesterday's ideas" (1996: 49). The same could be said for the growing number of assemblages stored in museums, ostensibly for their future research potential. Archaeologists may work on these collections in the future, but if the data are relevant, then they are relevant now. There is every reason to believe that if a site is worthy of extensive mitigation, the results are worth publishing. Archaeological significance has a plastic, contextual character. Apart from making data more widely available, peer review in publication would promote an ongoing molding of assessment criteria according to current research interests. In turn, the data would present new questions to the discipline. Perhaps it is time that practitioners passed the costs of publication on to their clients as part of the absolution of the clients' responsibility to the country's heritage.

Archaeological significance: Monuments

The blanket protection strategy adopted by the heritage authorities from the early twentieth century is in keeping with more recent calls for the protection of all archaeological sites, whatever their character (for example, Kristiansen 1989). However, the local consequence of the strategy, the nonproclamation of monuments, drew the attention of the heritage authorities away from archaeology and directed it toward colonial heritage sites. As a result, historians, cultural historians, and architects came to dominate the staff of the HMC and NMC. The monuments proclaimed to a large extent reflected the interests of the staff since it was they who put recommendations forward to the Minister. Indeed, a relatively high proportion of archaeological monuments in the 1940s reflected the interests of archaeologist C. van Riet Lowe, who was at that time secretary of the HMC, as well as those of the conservation bodies that stimulated the birth of heritage legislation in the first place.

In retrospect, the nonproclamation policy missed a key point. Monuments *are* created to protect sites of significance. But their declaration also serves as a mark of respect and commemoration for past cultures, people, and events. Monuments represent what is known about the past: according to the National Monuments Act, monuments should serve as "tokens of the past" and "inspiration for the future" (Section 2A). But monuments are also divisive in nature because they concern sectional interests, even if identified within the framework of a national theme (the Claim Your Heritage project). The declaration of monuments is an overtly political act in that it creates and acknowledges a particular past and, in doing so, enriches a particular present. Through their policy of nonproclamation, the HMC and NMC helped promote the erroneous impression among tourists and South Africans alike that the country's history began with the arrival of colonial explorers on our shores. The near absence of archaeological monuments played a collaborating role with ideological claims that black agriculturists had reached the country at about the same time as the first whites settled at the Cape, and that white settlers had moved into a largely empty land (see Maggs 1993). The past low public visibility of archaeology is surely also partly responsible for the currently limited public enthusiasm for a past created by mainly white archaeologists and the failure of the discipline to attract significant numbers of black students.

It would be easy to accuse the HMC and NMC of complicity in the support of apartheid. Hall (1992: 58) suggests that in the field of "statutory cultural conservation . . . accusations of élitism, Eurocentrism and simple racism . . . are as justifiable as they are for most other areas of state intervention in . . . human experience." But it is difficult to make the accusation stick from an archaeological point of view. The staff of the HMC was small, part-time, unpaid, and overworked. While secretary of the HMC, van Riet Lowe was also director of the Bureau of Archaeology (later renamed the Archaeological Survey). He had a busy

field schedule and visited many countries in Africa to advise governments on archaeological matters (Deacon 1990). It seems possible that the nonproclamation policy was considered an appropriate strategy to reduce the HMC's workload because archaeological sites already received blanket protection. It is also worth considering the pace of the development of research in South Africa.

In the first half of this century, the development of archaeology was relatively pedestrian (see Deacon 1990). It was only after R. Inskeep's appointment at the University of Cape Town in 1960 that South Africa witnessed an explosion in archaeological posts, students, and research. It was, for example, only in the late 1960s and early 1970s that the depth and breadth of agricultural history was recognized. Thus, by the time research began providing numbers of sites of monument-level significance, the principle of not proclaiming archaeological monuments was well established. If we are to seek active neglect of archaeology for ideological reasons, it is perhaps better found in the effective closure in 1962 of the Archaeological Survey, a government-funded statutory body. It was, as Inskeep (1962) termed it, a withdrawal of a moral responsibility toward the discipline (see Deacon 1993b). Thankfully, this withdrawal of direct support did not extend to archaeological research funding and posts funded by the government by less direct means. This was probably because science was viewed as somehow independent of society (see also Hall 1990, 2002). Nevertheless, it is true that the emphasis on the proclamation of colonial heritage sites contributed toward the construction of white South African culture at a critical time in apartheid history. Indeed, the altered focus of the HMC found support in the 1960s from a growing interest in colonial heritage among white South Africans (Hall and Lillie 1993). Perversely, when the general protection provided for archaeological sites was extended in 1986 to *all* historical sites older than fifty years, the NMC continued to declare colonial sites as national monuments on a large scale.

Archaeological monuments in KwaZulu-Natal

NMC personnel expressed concern in the early 1990s at the unrepresentative nature of the NMC's work (Hall and Lillie 1993). By this time, the organization had adopted a policy for the declaration of archaeological monuments following J. Deacon's appointment as the NMC archaeologist in 1989. Deacon called on the archaeological community to identify conservation-worthy archaeological sites to the NMC (SAAA 1991, 1992). The October 1992 edition of the *SAAA Newsletter* noted that the "National Monuments Council's Science Committee is keen to identify archaeological sites that are worthy of declaration as national monuments." The same edition included the NMC's "Minimum standards for archaeological site museums and rock art sites open to the public."

In line with this transformation, the Natal Regional Committee of the NMC established a project to (Hall 1992)

(a) establish criteria to evaluate archaeological sites in Natal for national monument status and,
(b) identify sites that merited declaration as national monuments.

A similar project was later established by the KwaZulu Monuments Council (KMC) to evaluate archaeological sites situated in KwaZulu, the self-governing homeland created for Zulu speakers by the apartheid regime.

I have described the two projects in detail elsewhere (Whitelaw 1997). Briefly, I created a scoring system to evaluate sites on the basis of research interest, character of deposit, and potential for public interest. I examined the records of 3069 sites, selecting those that merited assessment with the attribute tables (tables 9.1 and 9.2). Scores varied from 29 percent to 88 percent (excluding the bonus point). I suggested that all sites with scores of 70 percent or greater be considered for declaration as national monuments. The twenty-eight sites within this high-scoring group ranged from Middle Stone Age to rock art and agricultural sites. No Early Stone Age sites scored sufficiently high for inclusion, which is not surprising given the lack of Early Stone Age research in the province and the emphasis in the scoring procedure given to organic preservation and layered archaeological context. Five of the sites were subsequently declared national monuments.

The assessment procedure was not designed to have universal application. It had a specific purpose and should not be used in other contexts without consideration of its usefulness. The project also produced a personal selection of sites that might not be replicated by another archaeologist repeating the project—although I would like to think that there would be a good deal of overlap if the same scoring procedure was used—and especially not by a nonarchaeologist. This subjectivity is illustrated by one example.

I evaluated the rock art site of Gonzaga 1 in the Qudeni area of KwaZulu-Natal. The site comprises monochrome black and red paintings of human figures and an outlined image of an elephant. It is an interesting and well-preserved panel, but one which I did not rate sufficiently highly to propose as a national monument. However, the site is one of several which have considerable spiritual significance for people of the Sithole community living in the Qudeni area, who associate the paintings with their origins (Prins 1998). In the 1970s, the NMC considered the removal of the panel to the town of Eshowe for conservation purposes.

> Discussions took place without consulting the local community. After all, why ask contemporary Zulu people for their opinion about old San rock art? Fortunately this project never materialised. When I suggested this possibility to Sithole people two decades later this idea was met with fury and disbelief. Informants emphatically maintained that this action would have led to widespread discontent and even violence. It was also pointed out that

Table 9.1. Attributes and value points to assess archaeological sites for which there is no oral or written history

1. Degree of organic preservation	
none/poor (only nonorganic remains)	0
fair (fragmentary faunal remains, some charcoal)	1
good (good preservation of faunal and/or floral remains)	2
excellent (abundant floral remains or floral and faunal remains of great age)	3
2. Long sequences	
stratigraphic separation of two different layers/episodes of occupation	1
moderately complex sequences (3–5 separate layers/episodes)	2
long sequences (6 or more layers/episodes)	3
3. Presence of exceptional elements	
of some interest	1
of considerable interest	2
outstanding	3
4. Potential for future archaeological investigation	
Is the site's potential	
lacking	0
Or is the site a	
poor	1
moderate	2
good	3
example of its kind, such that a future researcher might consider it for further work?	
5. Degree of archaeological investigation	
recorded	1
tested and/or mentioned in publication	2
researched and adequately reported	3
6. Potential for public display	
Are there visible artifacts or features?	1
Are they intrinsically interesting?	2
Is the site physically accessible?	1
Is the site likely to appeal to public imagination?	2
7. Aesthetic appeal	
Are the environs of the site appealing?	
no	0
yes	1
Does the cultural content of the site have	
no	0
low	1
medium	2
high	3
aesthetic appeal?	
Maximum score obtainable:	25
Bonus point	
Is there potential for the implementation of a long-term management plan?	
no	0
yes	1

Table 9.2. Attributes and value points to assess archaeological sites for which there is oral or written history

1a. Historical and/or cultural significance	
Is the site associated with a person or group who was or were of	
little/no	0
some	1
great	2
historical or cultural significance?	
1b. Historical and/or cultural significance	
Is or was the site the scene of an event of	
little/no	0
some	1
great	2
historical or cultural significance?	
Alternatively: Is or was the site the scene of a material or social practice that is or was of	
no	0
some	1
great	2
historical or cultural value?	
2. Volume of oral or written history	
brief mention	1
some detail	2
plenty of detail	3
3. Degree of preservation	
poor (only non-organic remains)	0
fair (faunal remains, some charcoal)	1
good (features preserved)	2
4. Degree of research	
mentioned in publication	1
researched in some detail	2
5. Potential for public display	
Are there visible artifacts or features?	1
Are they intrinsically interesting?	2
Is the site physically accessible?	1
Is the site likely to appeal to the public imagination?	2
6. aesthetic appeal	
Are the environs of the site appealing?	
no	0
yes	1
Does the cultural content of the site have	
no	0
low	1
medium	2
high	3
aesthetic appeal?	
Maximum score obtainable:	21
Bonus point	
Is there potential for the implementation of a long-term management plan?	
no	0
yes	1

> local knowledge systems have contributed much towards the preservation of these paintings . . . as it is widely believed that human damage to Bushman art will cause the offender to "lose his mind." (Prins 1998: 116)

Regardless of their origin, all heritage sites may contribute to a sense of identity and place. Their presence allows people to key into existing cultural and historical frameworks. The city of Pietermaritzburg, for example, is widely known for its red-brick Victorian and Edwardian buildings. One such structure, once an exclusive school for "young ladies," was rehabilitated through a project which focused on the development of building skills (Hall 1992). Now known as Tembaletu (Anglicized Zulu for "our hope"), the building has become an adult education and skills-training center for people placed at an economic, political, and social disadvantage by apartheid.

Reuse of rock art sites of a rather disturbing kind occurs elsewhere in KwaZulu-Natal, where traditional healers scrape paint off the rock face for use as a principal ingredient in protective medicine. Traditionally, the medicine provided protection from witchcraft and various supernatural beings. It is today believed that the medicine provides protection from bullets. Consequently, there appears to have been a surge in damage to rock art in the conflict-ridden 1980s and early 1990s (F. E. Prins, personal communication). The practice presents a difficult challenge to heritage managers. The archaeological material is valued, but its very value is the cause of its destruction. Is it possible to stop the practice? And is it even ethical to do so? Prins believes alternatives to the paint may provide a solution, but we can only hope that political and economic conditions ameliorate to the extent that the practice is considerably reduced or stops altogether. Whatever the case, reuse such as this and Gonzaga 1 attributes significance to sites that may not be evident to uninformed observers. It is advantageous, therefore, for local interest to be embedded as a principle of heritage management, as it is in the new legislation, as its cultivation is in most cases likely to be the surest route to protection.

Current legislation

Since April 1, 2000, the National Heritage Resources Act has governed the management of South Africa's heritage. The act established the South African Heritage Resources Agency (SAHRA), which replaced the NMC. SAHRA is charged with the overall management of the national estate, comprising sites or objects that are and will be of significance or value to South Africans now and in the future. Of interest is that the act promotes research into "living heritage," that is, oral tradition, ritual, and indigenous knowledge systems. Archaeological sites and archaeological objects recovered from South African soil or waters are among the resources listed as part of the national estate. Also included is anything with the "potential to yield information that will contribute to an under-

standing of South Africa's natural or cultural heritage" (Section 3.3.c). Further, blanket protection for archaeological sites is retained, as is the permit system, while all archaeological objects other than those already collected without a NMC permit become property of the state. The exempted objects remain the property of the owner, who should have registered their details with the responsible heritage authority by April 1, 2002.

A major departure from earlier heritage legislation is the provision made for impact assessments. This gives the heritage authorities a greater compliance role than any earlier heritage authority had. Developers are required to notify heritage authorities about any proposed development over certain specified size categories. The heritage authorities may require that an impact assessment be carried out at the developers' cost. The criteria for evaluating heritage resources are not specified, though reference is made to management principles that are applicable to both national and provincial heritage authorities. The most important of these are the following, laid out in Section 5.7:

> The identification, assessment and management of the heritage resources of South Africa must:
>
> (a) take account of all relevant cultural values and indigenous knowledge systems;
> (b) take account of material or cultural heritage value and involve the least possible alteration or loss of it;
> (c) promote the use and enjoyment of and access to heritage resources, in a way consistent with their cultural significance and conservation needs;
> (d) contribute to social and economic development;
> (e) safeguard the options of present and future generations; and
> (f) be fully researched, documented and recorded.

There is recognition here of multiple and different value systems that might be applied to heritage sites, and of the minimal impact principle that Carver (1996) advocates. If these requirements are to be properly fulfilled, it is critical that heritage assessment teams have a multidisciplinary character incorporating, for example, archaeological, anthropological, historical, architectural, economic, and museological expertise. We are a long way from this goal in South Africa.

The act provides for a three-tiered system for heritage resources management in line with the principle of devolving responsibility for heritage matters to the lowest competent authority. SAHRA is responsible for national-level functions, provincial heritage agencies for provincial-level functions, and local authorities for local-level functions. SAHRA managed the national estate until April 1, 2002 (KwaZulu-Natal excepted), by which date all provincial heritage agencies should have been established. Unfortunately, only KwaZulu-Natal had the appropriate legal and administrative structures in place. (The result was a legal impasse: no

permits could be issued for excavation or destruction—a provincial-level function—outside of KwaZulu-Natal. By May 2003, two other provincial heritage agencies were established, and others were in the pipeline.) In KwaZulu-Natal, *Amafa aKwaZulu-Natali* (Heritage KwaZulu-Natal), was established on April 1, 1998 under the KwaZulu-Natal Heritage Act (No. 10 of 1997). The act anticipated the national legislation, providing some inspiration to its authors. Not surprisingly, given the order of their evolution, there are inconsistencies between the national and KwaZulu-Natal legislation which may require amendments in the future.

Formal protection provided by both acts is broadly similar to that of the National Monuments Act. In KwaZulu-Natal, Amafa may confer Provincial or Heritage Landmark status upon a site with "important elements of the heritage" of the province (Section 19.20.1), the distinction resting upon the ownership (public or private) of the property on which the site is situated. Amafa may designate buffer areas (Sensitive Sites) around landmarks for their protection. Amafa must compile a Heritage Register of conservation-worthy sites, and may declare significant objects or collections thereof as Heritage Objects. The act provides no clue as to how significance will be defined in each of these cases. It does, however, indicate that assessment criteria for CRM projects will be set out in regulations (Section 27.3.b). As already noted, these must be consistent with principles established in the national legislation. The regulations are not yet available.

Like the earlier and new national legislation, the KwaZulu-Natal Heritage Act provides blanket protection to archaeological sites and objects, but with an interesting rider that does not quite amount to an exception: it is "provided that *Amafa aKwaZulu-Natali* may . . . take account of existing small-scale agricultural activities" (Section 26.6.a). A large percentage of KwaZulu-Natal's population is engaged in subsistence agriculture, often on land that is archaeologically extremely rich. While they are required to cease operations upon discovery of archaeological remains, their activity and needs place a different, nonarchaeological value on the land containing those remains.

In a recent case in the Thukela Valley, the ninth century A.D. site of Mamba with evidence of large-scale industrial activity (see van Schalkwyk 1994b; the site was one I identified as a possible monument) was cleared of vegetation during the course of a project to establish community gardens. Amafa's negotiations with the garden committee and the traditional authorities achieved a successful resolution whereby the gardens would not be located on that part of the site with the greatest concentration of archaeological material. Amafa accepted this compromise knowing that the gardens would be subject to hoe rather than mechanical tillage. The community clearly appreciated the sensitivity of the archaeological remains and was prepared to work around them, even though their presence affected the development of what would hopefully become an important economic resource. This willingness to compromise may in part have been due to the

excavation projects that had been going on the immediate area since the late 1970s; one member of the garden committee had actually worked on an excavation project (L. O. van Schalkwyk, personal communication). Amafa has demonstrated skill in negotiations of this sort, but it is going to be interesting to see the results of similar negotiations in areas in which archaeology is an unfamiliar concept.

Existing national monuments in KwaZulu-Natal became provincial heritage sites in terms of the national legislation, though they require assessment by April 2005 to determine whether any are of national significance. Those determined to be of national significance will become national heritage sites and the responsibility of SAHRA. The tiered management system is linked to a system of grading of resources that SAHRA must establish. The grading must include at least three grades (Section 7.1) such that Grade I comprises sites and objects of national significance that are the responsibility of SAHRA; Grade II sites and objects are of provincial or regional significance that are the responsibility of provincial heritage agencies; and Grade III comprises other conservation-worthy sites and objects that are the responsibility of local authorities. Ordinarily, archaeological sites and material are Grade II resources and managed by provincial heritage agencies, unless they are "so exceptional that they are of special national significance" (Section 7.1.a), that is, Grade I resources. SAHRA is required to develop criteria "to assess the intrinsic, comparative and contextual significance of a heritage resource and the relative benefits and costs of its protection, so that the appropriate level of grading of the resource and consequent responsibility for its management may be allocated" (Section 7.1). The criteria should be consistent with principles in the act, which rate significance in terms of community or historical importance, rarity value, information value, representivity, aesthetics, and cultural associations.

Underpinning significance-grading systems is the idea that significance resides within heritage resources rather than is assigned to them (see Tainter and Lucas 1983). The whole idea of grading heritage resources against defined assessment criteria seems at odds with the principle of devolving responsibility for heritage to the lowest level, and I suspect that it will not be possible to do so without difficulties. For a heritage resource mapping project, a group of heritage workers in the Cape Metropolitan Area defined Level 1 areas (equivalent to Grade I) as those "of high heritage significance that are of national importance." Significance is assessed in terms of a fairly standard checklist of attributes, but no way of measuring is provided. The group noted, "assigning sensitivity or importance to any given area is subjective and based very much on the experience and disciplinary background" of the assessor (unpublished notes from a workshop held on May 28, 1999, Archaeology Contracts Office, University of Cape Town). Unsurprisingly, this seems as far as the group was prepared to go.

Conclusion

Significance is always assigned by interest groups, which are by definition local or in some sense limited. Significance is associated with sectional interests and is therefore a political resource. The plasticity of significance provides an interesting conundrum for SAHRA, which is required to "guard against the use of heritage for sectarian purposes or political gain" (Section 5.1.d). Given this, what would make an archaeological site so exceptional that it was rated Grade I? Two things, I think. The site must either be conceived as culturally and therefore politically neutral, or it must be politically exploitable, useful in pursuit of current governmental priorities such as President Mbeki's vision of an African renaissance. Cultural neutrality may be achieved by great time-depth, such that the sites may be claimed by all humanity rather than sectoral interests within South Africa. Examples include the hominid sites in the Sterkfontein Valley and long-sequence Middle Stone Age sites such as Border Cave, Blombos, and Klasies River Mouth. (Creationists would, of course, disagree with this proposal, indicating how unattainable "cultural neutrality" is: the term is truly an oxymoron.)

For President Mbeki, the African renaissance "links the past to the future and speaks to the interconnection between an empowering process of restoration and the consequences or the response to the acquisition of that newly restored power to create something new" (Mbeki 1998). Resources that may be exploited in pursuit of the renaissance include the K2-Mapungubwe complex in the Limpopo Valley, representing precolonial African state formation, and the San rock art of the Drakensberg, representing aesthetic achievements of indigenous Africans. Motivations for Grade I status might well emphasize the general Africaness of the resources rather than the specific identity of their creators (and descendants of the creators), allowing for their appropriation by all South Africans. Also though, some Grade I sites, the Drakensberg for example, could serve a dual political purpose in that they might be exploited for sectional interests in ways that do not jeopardize and may support the ruling party's hegemony.

Archaeological sites may also serve other governmental priorities. Mbeki noted their potential for tourism and job creation in his state of the nation address in February 2000. This brings me to my final point. At least one other criterion is likely to play a significant role in Grade I evaluations. SAHRA is likely to ask how each heritage resource can contribute to the social and economic welfare of South Africans, in particular those that might live adjacent to the resource. The problem heritage authorities face is similar to that faced by conservationists throughout Africa: to show that conservation can improve the day-to-day lives of people (Hall 1992). Said another way: "If monuments pay they stay" (van Schalkwyk 1995: 41). A nonarchaeological example from KwaZulu-Natal illustrates one strategy.

The battle of Isandlwana was fought on January 22, 1879. During the course of the day, the Zulu army routed British forces in one of the worst colonial defeats

suffered by the British army. The battle site has since become a place of pilgrimage for mainly white local and international Anglo-Zulu war enthusiasts. The KwaZulu Monuments Council (KMC) inherited the management of the site from the NMC in the early 1980s and was confronted with an extremely limited protected area, vandalism, and homesteads, a road, a shop, and a school, all constructed on the battlefield. Discussions involving the local community, the KMC, and other provincial structures resulted in the replacement of the road by an upgraded version routed around the battlefield; the removal of the school and shop from the battlefield and their construction elsewhere; and a protected area increased from 2.8 ha to 815 ha, encompassing the larger part of the battlefield. The protected Historical Reserve was fenced. Local people have free access to the reserve and may collect firewood and graze a limited number of cattle therein. Other members of the public are now charged an entry fee. The local Traditional Authority receives a quarter of all revenue received. Furthermore, the reserve is a source of jobs, and local school children are trained as guides. The process took more than ten sometimes-difficult years of negotiation. Amafa, however, now has a product of considerable value (van Schalkwyk 1995). In 1999, a monument to the Zulu dead was unveiled at the battlefield, another appropriation of a heritage site that seemingly cements Isandlwana's value in modern South Africa.

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III

Judging value and importance

10

"Drawing distinctions"

Toward a scalar model of value and significance

Clay Mathers, John Schelberg, and Ronald Kneebone

Introduction

Context, taxa, scale, and space were among the keystones of archaeological thought and analysis even before the discipline crystallized formally in the nineteenth century. Although these concepts continue to be essential to our understanding of archaeological remains and heritage today, it appears that they are often neglected in the contemporary practice of cultural resource management (CRM). In focusing on these key components of archaeological thought and practice, we hope to reenergize discussion about the future of archaeological heritage management. At the same time, we are hopeful that many of the points raised below will contribute to wider discussions within the discipline concerning formation processes, contextual/spatial approaches, and archaeological praxis generally.

The return to elemental concepts such as space, context, scale, and taxa makes it clear that the heritage management literature has been here before. However, the notion that this ground has been traversed already, and is therefore sterile or unlikely to produce anything of real substance, seems to ignore many fundamental dimensions of heritage management that remain as beguiling, complex, and unresolved as they were when they were first raised more than thirty years ago. These issues include (but are by no means exclusive to) such major topics as how archaeological value and significance are evaluated; what defines and distinguishes *sites* and *isolated finds*; what scales of analysis are appropriate for assessing significance; and how we understand the different dimensions of space in both evaluating and managing cultural resources. All of these questions remain critical to the health of the discipline as a whole, as they have in the past. Their importance is not restricted to either the management-focused or the research-oriented arms of archaeological practice, but applies in equal measure to both.

It seems particularly ironic that archaeologists use concepts such as *context* to distinguish professionals (like themselves) from more amateur enthusiasts, when many aspects of context frequently have been sacrificed to tell their story, their way, and with their focus. Very little effort (and literature) has been devoted to self-critical, historical analyses of the *practice of heritage management,* especially in North America. Equally, there is little recognition, apparently, that archaeologists themselves have a significant impact on the archaeological record, and that agents of change and transformation are not restricted exclusively to people in the past, or to the environment. The focus of this discussion is, therefore, less on what archaeologists claim to be *best practice* with regard to heritage, and more on what the practice of heritage management has actually been, what consequences it has had, and (with a critical eye towards the future) what archaeology and heritage management could become.

In an attempt to provide concrete examples of where we have been and where we might go, our discussion relies on a set of spatial and quantitative analyses conducted on archaeological sites in Rio Arriba County, in north-central New Mexico. The number of sites included in this study (10,452) and the geographic breadth (5,894 square miles) underline our desire to expand the analytical frame of archaeological significance beyond single sites, as well as the methods used to investigate it. Although the emphasis of this discussion is a reflection of American legislation and archaeological practice concerning heritage management, we hope that the following discussion will provide observations that will be of value to others.

Points of departure: The National Register in context

The National Register of Historic Places (and the legislative act that brought it into being) was the focus of considerable debate shortly after it was established. Judging by the extended hiatus in the professional, peer-reviewed literature regarding this subject, however, it appears that many archaeologists and heritage professionals in the United States have now accepted the broadly phrased language of this act. Whether this acceptance is an artifact of reluctant resignation or a cheerful embrace of laws that provide considerable latitude and flexibility, little critical attention has been devoted to determining what de facto criteria determine a site's eligibility for the National Register (NR) and the protections that eligibility affords to it.

The laws governing historic preservation in the United States, as elsewhere, have been subjected to the bias of both legislation and legislators during the course of their evolution (for examples outside of the United States, see Carman; Funari; Smith; and Whitelaw, this volume). Practical implementation and interpretation of these laws by archaeologists has further conditioned what remains of the extant cultural record. Despite some implicit and explicit acknowledgment of these effects, American efforts at heritage management seem to be reluctant or

unwilling to move beyond the anecdotal to the analytical. Most U.S. professionals are aware that NR sites have a differential focus on historic, rather than prehistoric sites, and poorly represent the diversity of our cultural experience with respect to ethnicity, site function, economic class, site size, chronology, and other important variables. Without an understanding of the nature and magnitude of these discrepancies, as well as their implications, it is arguable whether we are doing a reasonable and responsible job of managing our nation's cultural patrimony. A closer examination of archaeological praxis is therefore in order.

New Mexico case study

In New Mexico, the work of the State Historic Preservation Office (SHPO), and that of the Database Management Branch subsumed under it, has provided us with extraordinary insight into how heritage management laws have been interpreted and their concrete implications on the ground. Many questions concerning the *what, where, when, how,* and *why* of archaeological and heritage management practice can be addressed with these data in a way that moves us beyond anecdotes and toward some of the large questions that are important to the profession as a whole.

The sites we have focused on in this paper lie in Rio Arriba County, situated in north-central New Mexico immediately east of the heartland of the Chaco phenomenon (located in adjacent San Juan County) (figure 10.1). The Continental Divide, which separates east- and west-flowing drainages in the United States, falls in the western third of Rio Arriba. One of the major tributaries of the Rio Grande, the Rio Chama, flows east from the Continental Divide and joins the Rio Grande proper in the southeastern corner of the county. The Rio Chama corridor forms the principal drainage in the area and has been a major focus of historic and prehistoric occupation in this region of New Mexico, especially following population decline in the San Juan Basin in the thirteenth century and migrations to neighboring areas, including Rio Arriba (Stuart and Gauthier 1984; Adler 1996).

Representativeness

One of the concepts of archaeological significance and value that was most cited and discussed during the formative period of American CRM, was the idea of *representativeness* (see Briuer and Mathers 1996a, 1996b). In essence, the notion of representativeness was intended to convey the idea of a sample of cultural remains from a given geographic area that accurately reflected the range of human cultures and activities that had taken place there through time. Although this term is rather idealistic and ill-defined (spatially, theoretically, and otherwise), U.S. archaeologists have, since the mid-seventies at least, generally agreed that the goals of heritage management need to include this important component.

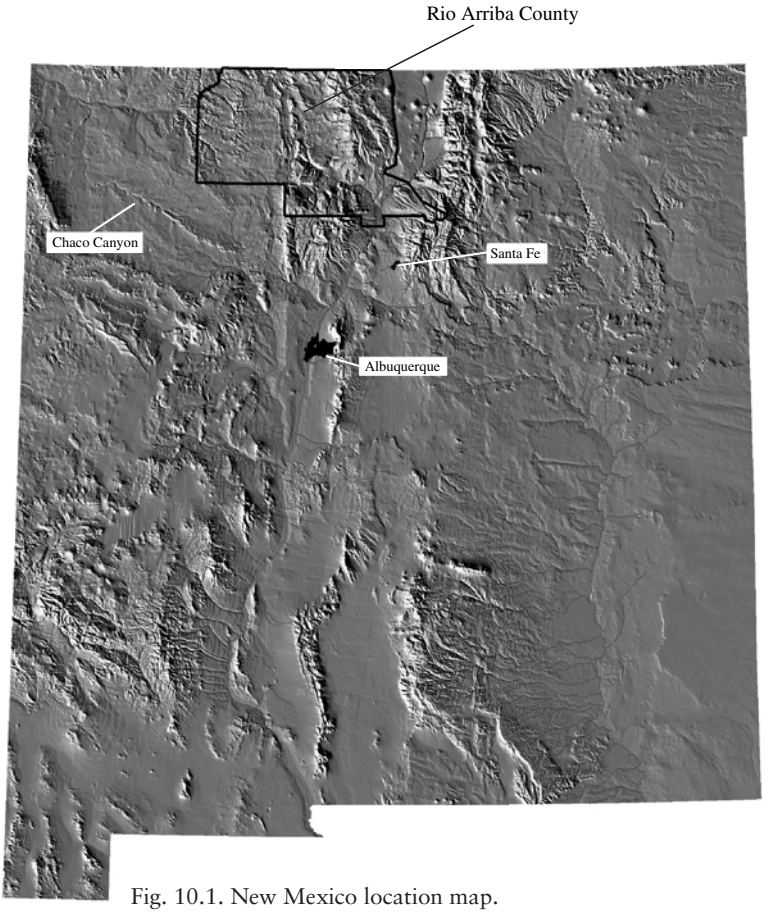

Fig. 10.1. New Mexico location map.

Certainly, if the public's goals of a more pluralistic society and the discipline's aim to maintain a reasonable sample of sites for future research are to be viable, the notion of a *representative* sample will play an important role.

An examination of our Rio Arriba data makes it clear that these goals are far from being achieved. Figure 10.2 compares the number of recorded archaeological sites in this county by chronological period with the number of archaeological sites currently listed (by period) on the National Register. The aim of this analysis was to test whether the site frequencies for different chronological/cultural periods were related proportionately to the number of NR sites for those same periods and cultural phases.

The pattern that emerges from this analysis is that some of the shortest chronological periods (for example, the Pre-Pueblo Revolt, Pueblo Revolt and Post-Pueblo Revolt, Post Reconquest, Spanish Colonial, Pre-Reservation, U.S. Territorial, N.M. Statehood/WWII, and Recent Historic periods), have the greatest representation on the National Register. Notably, all of these periods are historic.

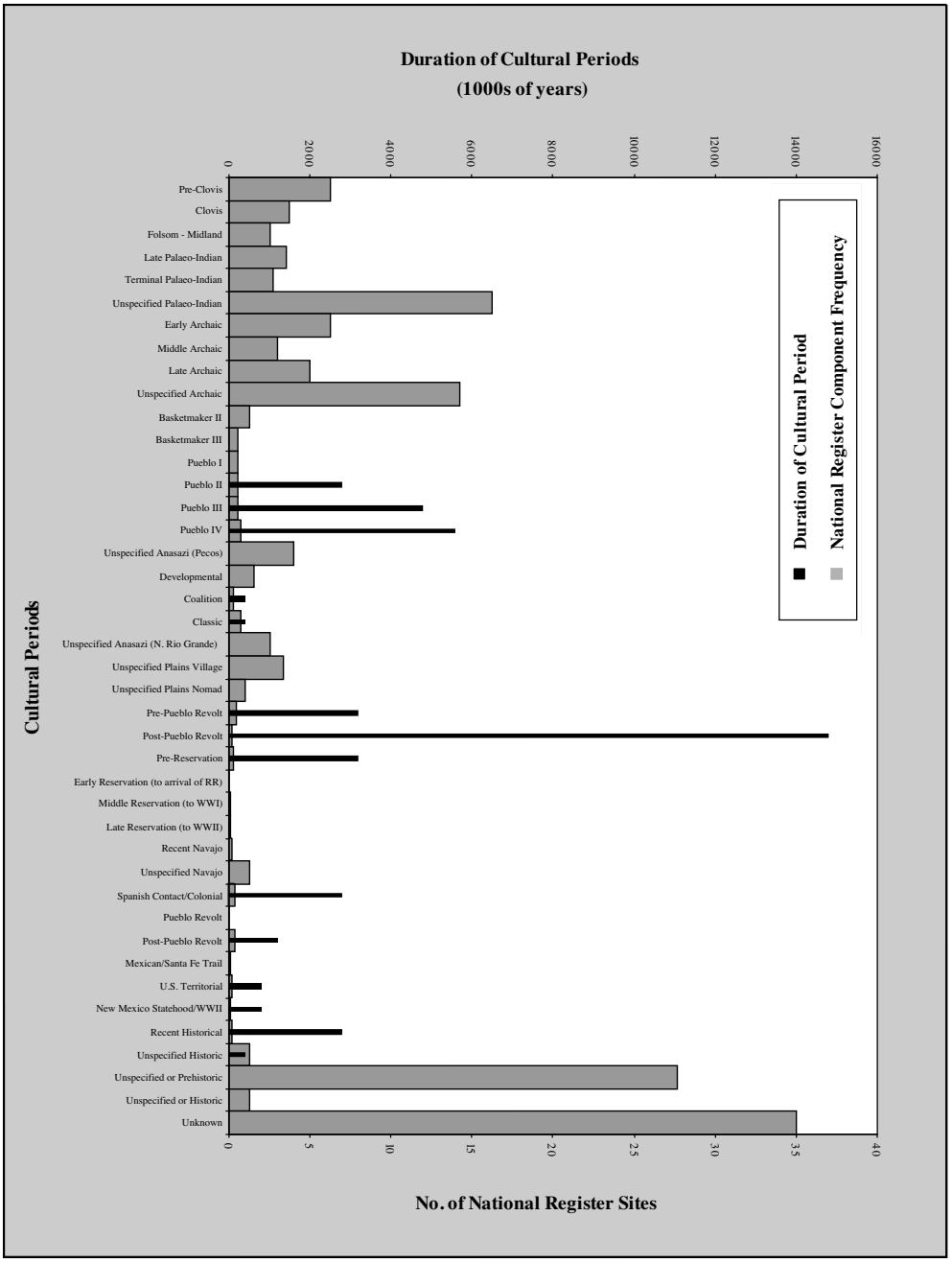

Fig. 10.2. Representation of National Register sites versus all known archaeological sites (by chronological period and duration of period) for Rio Arriba County, New Mexico, 1900–1995.

By contrast, the periods preceding and including the Pueblo I phase occupy the vast majority of the prehistoric sequence in Rio Arriba and are represented by no NR sites whatsoever. Clearly, the aim of selecting a sample of sites for the NR that is an accurate reflection of our cultural heritage in this area has not been met. It should be pointed out that sites that are eligible for the NR, and those that are nominated and listed on it, are afforded similar degrees of protection (at least in theory). Obviously, the type of analysis undertaken to produce figure 10.2 could be carried out on sites classed as *eligible* and *ineligible* as well, to provide a more complete and balanced picture of current archaeological practice. Many of the decisions about eligibility, however, are made without undertaking this rather elementary type of historical analysis.

The point here is not so much to critique our colleagues (past and present) who have struggled to formulate and implement preservation policies. Many of them, especially those in SHPO offices, are frequently understaffed, overworked, and underpaid. Instead, what we hope to illustrate is that analysis, research, and management are integral to one another, and should be pursued regularly by all branches of the discipline, rather than be reserved for university-based archaeologists. The benefits of these activities are too important and critical for effective resource management to be the exclusive domain of so few (see Schiffer and House 1977 for an earlier argument along these lines).

Without such analyses and regular stocktaking of where we are and what effects our policies are having, questions can certainly be asked about our claims to be following *best practice*. While data of the type displayed in figure 10.2 may not alter significantly either the policies of SHPOs across the country or many of their newly established counterparts (that is, Tribal Historic Preservation Offices or THPOs), at least these policies would be pursued on the basis of a clearer understanding of (and better empirical evidence for) some aspects of our current heritage management practices.

There is one other brief and related point about *representativeness* that we would like to raise. The relationship between the archaeological community and native/minority communities continues to be critical to the health and general understanding of archaeology and heritage management, as well as the public support for them. With the emergence of independent heritage bodies in the form of THPOs, it is even more important for groups that are formulating the policies and strategies for managing our collective heritage to communicate regularly, and to share their analyses and research with one another. The failure to do so will create an idiosyncratic and eclectic site record that will be national in name only. The challenge before us is to create a National Register that is more than a reflection of our nation's *major* cultural norms and history, but is instead inclusive and as diverse as our whole nation's past and present. Part of what is needed if we are to make that goal a more tangible reality is the data and analyses to understand how we are actually practicing archaeology and heritage management.

Regional context and analysis

Another dimension of past discussions of archaeological significance, in North America and elsewhere, is the importance attached to regional analysis and regional context (Scovill et al. 1972; Lipe 1974; Schiffer and Gumerman 1977; Moratto and Kelly 1978; Plog 1981; Tainter 1987; Knoerl et al. 1989; Delgado 1992; Townsend et al. 1993; Schelberg 1996). Although this seems like a penetrating glimpse into the obvious for most archaeologists and heritage professionals, definitions and examples of regional approaches to significance evaluation continue to be rare, long after the calls to adopt such approaches.

Despite the emergence of interest in cultural landscapes (for example, Crumley and Marquardt 1990; Bender 1993; Crumley 1994; Tilley 1994; Hirsch and O'Hanlon 1995; Ashmore and Knapp 1999;), including the recognition of historic districts and cultural landscapes by the U.S. Park Service, and multisite landscapes by international bodies such as the International Council on Monuments and Sites (ICOMOS, Pomeroy, this volume), site evaluations in the United States at least, continue to be done largely on a site-by-site basis. For the same reason that we argue that individual objects are diminished in their significance by removal from their original context, it is difficult to see the merits of doing precisely this at a regional scale by divorcing individual sites from the larger cultural, geographic, and other matrices in which they are embedded.

In analyzing data from Rio Arriba County, we were particularly interested in evaluating the wider regional context of sites around the Abiquiu Reservoir, operated by the U.S. Army Corps of Engineers. By combining local and regional scales of analysis, that is, individual sites and the larger constellations of sites of which they form a part, new patterns emerge that are critical in evaluating archaeological significance beyond the level of single sites. A comparison of one portion of our study area (the Abiquiu Reservoir area) with the rest of Rio Arriba County showed that an appreciable number of the Archaic period sites located in the county as a whole are found at Abiquiu (Schaafsma 1976, 1977; Reed et al. 1982; Reed and Tucker 1983; Wozniak et al. 1992). Although the reservoir region composes less than 1 percent of the total land area, it nevertheless contains nearly 14 percent of the known Archaic period sites. Without this wider perspective, management decision makers who focused on the reservoir area alone might infer that Archaic sites were relatively common, and therefore expendable. Comparisons between the sites known at Abiquiu and those listed on the National Register further highlight the value of the sites represented at Abiquiu, since no Archaic period sites in the whole of the study area are found on the National Register (figure 10.2). If archaeologists are to succeed in securing a *representative* sample of our cultural heritage for the future (Thompson 1974; Dixon 1977; Schiffer and House 1977; Raab and Klinger 1979; Dunnell 1984; Reed 1987; Smith 1990; Grumet 1992), knowledge of such gaps and biases in our preservation policies is essential.

From a still larger, international perspective, the Archaic period in the American Southwest marks one of the key sequences we have to understand the transition from late glacial hunting and gathering to sedentary food production (Matson 1996; Huckle 1996; Plog 1997; Wills 1988a, 1988b). Blessed with extraordinary preservation, large numbers of sites, a rich ethnographic and paleoenvironmental record, as well as high-precision dating, the archaeological record here has major advantages that are lacking elsewhere. The preservation of key components of this record is clearly something requiring strategies that are predicated on broad regional approaches and analyses, rather than narrower administrative perspectives focused on single sites.

Another aspect of contextual analysis at a regional scale that is essential for evaluations of significance is an accurate assessment of *surveyed space*. Areas where archaeologists have focused major attention in the past are obviously likely to produce larger numbers of sites than those that have been less frequently visited and investigated. Our ability to assess these differences, either in qualitative or quantitative terms, has until recently been very limited. Thanks to some extraordinary efforts in the states of New Mexico and Arkansas, to name a few, archaeologists in the United States are beginning to gain insight into how well different parts of the country have been investigated: when work was conducted, how frequently, using what methods, and so on.

The importance of understanding the historical evolution of the archaeological record has been something that U.S. archaeologists, especially those in the heritage management realm, have seemingly placed less emphasis on than their European counterparts, some of whom have traced more than 150 years of change in the patterns of land use, antiquarian collecting, and archaeological investigation (for example, Kristiansen 1985, 1996, Holman 1985).

Our analysis of the Rio Arriba data suggested that differences in the way the land has been used are of absolutely critical importance to how we understand and evaluate regional patterning in the archaeological record. Figure 10.3 illustrates a large void in the dense distribution of archaeological sites in the north-central area of Rio Arriba County.

Although it was initially unclear why this gap exists, eventually it emerged that the void is largely an artifact of an early Spanish land grant, the Tierra Amarilla, which encompasses a large area, the majority of which has remained in private ownership since the nineteenth century (Wozniak et al. 1992). In this case at least, differences between private and public lands with respect to archaeological fieldwork and recorded site densities are profound (figure 10.4). There are also major differences in site densities and discovery patterns for each of the major land holdings in the area, which are administered by state and federal agencies as well as by Native American communities. These differences are clearly related to modern land management and survey intensities, and are not explicable merely in terms of variations in surface visibility, natural resource potential, or other major *environmental* factors.

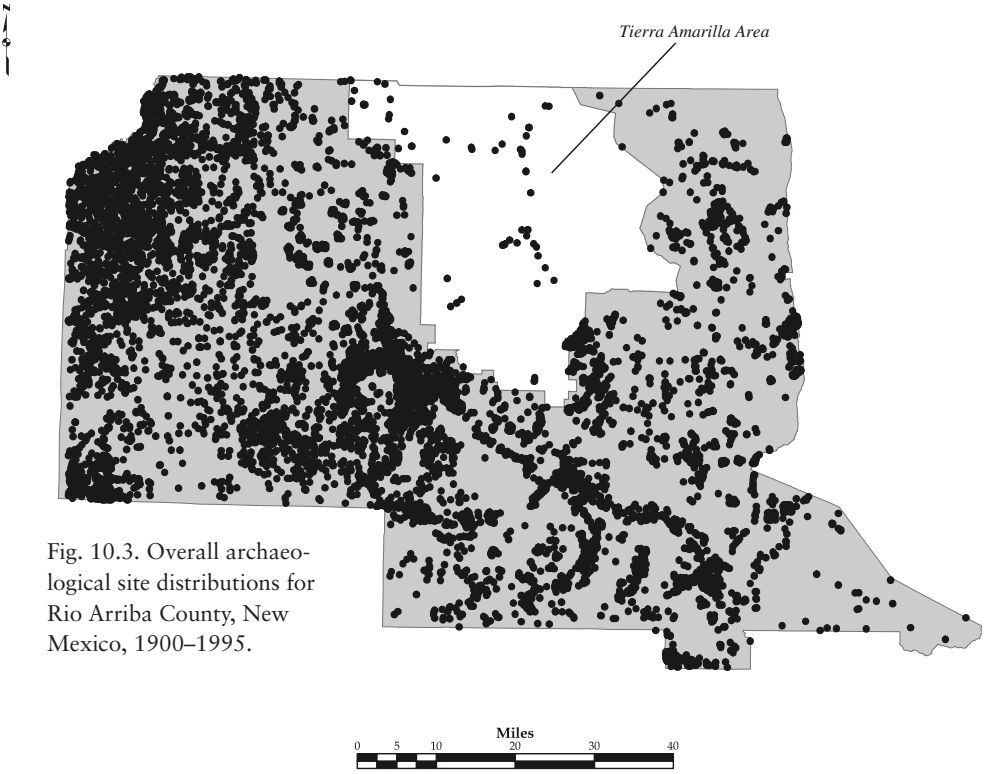

Fig. 10.3. Overall archaeological site distributions for Rio Arriba County, New Mexico, 1900–1995.

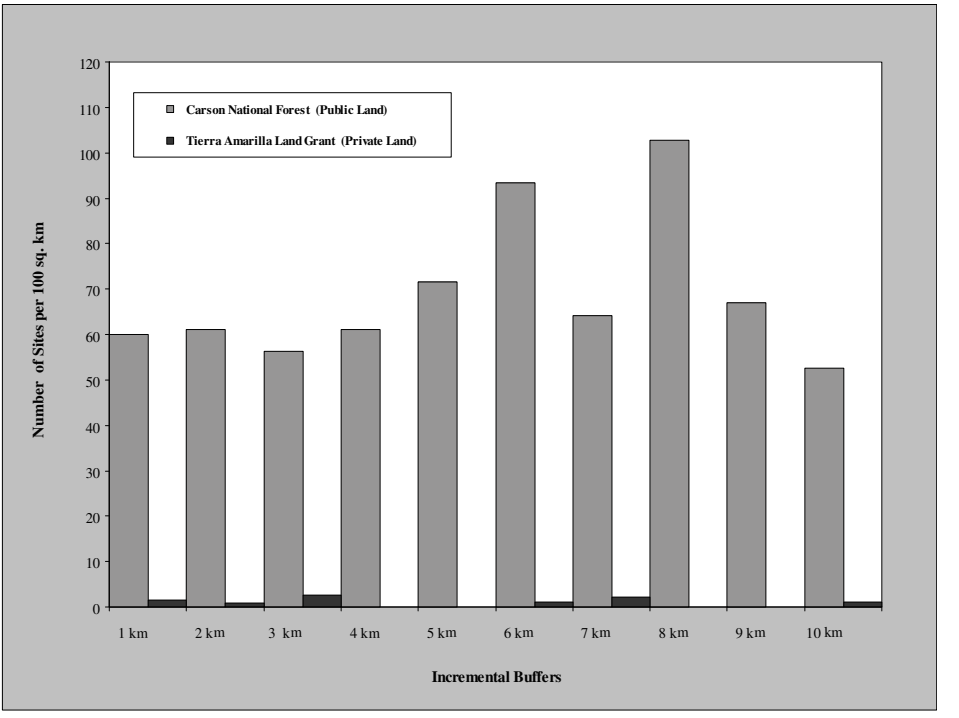

Fig. 10.4. Comparison of site densities for buffers extending 1–10 km in the Carson National Forest and the Tierra Amarilla Land Grant, Rio Arriba County, New Mexico.

A detailed geographic information systems (GIS) analysis along the perimeter of the Tierra Amarilla land grant revealed the magnitude of the differences in site densities between areas within the grant (which are largely, but not wholly private), and adjacent land to the east, administered by the USDA Forest Service. Taking the private–public boundary on the eastern edge of this grant as the starting point, a series of one-kilometer-wide buffers were created, radiating out to ten kilometers. The result was a series of buffers extending from 1 to 10 kilometers inside the Tierra Amarilla land grant (largely in private ownership), and a similar set of nested buffers inside the Carson National Forest, publicly owned and administered exclusively by the USDA Forest Service.

This analysis demonstrates that there are major differences in site densities (a minimum ratio of 30:1) between public and private land in this area in each of the buffer zones—despite a larger proportion of high altitude, broken terrain and more heavily vegetated ground surface in the Carson National Forest. (The density figures reported above have been normalized to account for the different surface areas, because of topological differences, between each pair of buffers, since a 1-km-wide buffer in the Tierra Amarilla grant, for example, does not have an identical surface area to the corresponding 1-km-wide Carson National Forest buffer.) These major variations highlight different land-management practices, particularly the statutory requirement for cultural resource inventories on the public land managed by the Forest Service.

Data quality

Another important aspect of archaeological analysis, whether in the context of heritage management or not, is the quality of data on which evaluations are based. Surprisingly, perhaps, this aspect of interpretation has seldom been a major topic of discussion in the peer-reviewed literature relating to CRM or in the practice of U.S. archaeology generally.

It is perhaps no coincidence that the period from the mid-1970s to the mid-1980s marked something of a peak in archaeological discussions of both significance and site recovery/survey techniques. As the number of sites being reported increased dramatically with the introduction of new legislation as well as theoretical and methodological tools for investigation and analysis, questions concerning what to preserve, and how much, began to surface regularly in the literature. The lessons of plowzone archaeology (Ammerman 1981, 1985; Baker 1978; Ammerman and Feldman 1978; O'Brien and Lewarch 1981; Wandsnider and Camilli 1992; Steinberg 1996; Boismier 1997), however, were seldom translated into heritage management circles, so that problematic issues such as a site's size, depth, chronology, function, integrity, and uniqueness, were usually not the subject of debate or analysis, except among those whose task it was to investigate and evaluate individual sites. These variables are, however, arguably basic attributes of any site and are among the principal criteria used in evaluating a site's

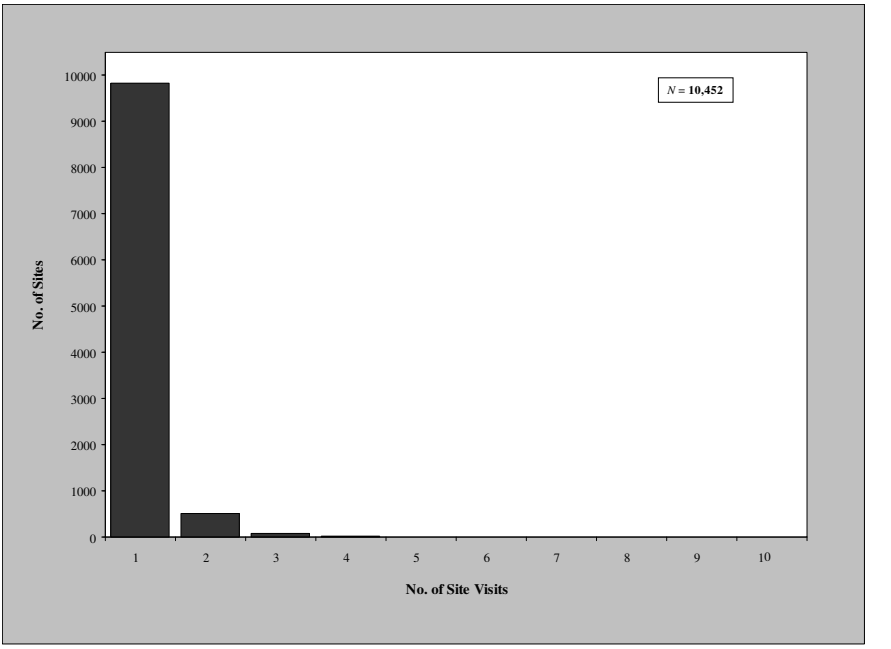

Fig. 10.5. Site visitation/recording frequency in Rio Arriba County, New Mexico, 1900–1995.

significance. If there are major questions about one or more of these variables, such as a site's size or chronology, then it follows that other attributes may be called into question as well, such as the site's integrity, depth, function, or uniqueness.

As much of the sampling, survey, and *plowzone* archaeology of the 1970s and 1980s demonstrated, field investigations of the archaeological record are conditional and context-dependent, and, like the concept of significance itself, they are dynamic as well. Hirth's (1978) survey in the Basin of Mexico, for example, reported an eightfold difference in sherd density when the same area was repeatedly surveyed, largely because of intervening rainfall and agricultural disturbance. It should go without saying that a strong link exists between what we know about a given site and the number of times that site has been investigated. Visitation frequency is obviously a variable that requires greater attention in the context of significance evaluation: when was the site visited (1930 or 1990?) *and* last visited, what methods were employed in its investigation (for example, pedestrian survey, coring, shovel tests, area excavation), and what techniques were used in determining its geographic boundaries?

In Rio Arriba, a significant number of sites have been minimally recorded. The vast majority of archaeological sites in the county have been visited only once, 9,841 out of 10,452 or nearly 94 percent (figure 10.5). In addition, the vast

majority of these have not been subjected to anything more than a one-pass, pedestrian survey, suggesting that our knowledge of their true nature (size, date, chronology, integrity, depth, and so on) must be incomplete at best. When sites known from either one or two visits are combined, the total number reaches 10,355 (99 percent).

If the superficial nature of these investigations seems unproblematic, the case of a site from Abiquiu Reservoir is worth highlighting. Although the site was identified on three separate occasions as a *lithic scatter,* it was intentionally included in a small sample of sites earmarked for excavation with the aim of obtaining a chronometric date, given the apparent presence of a single hearth on the site. Upon excavation, it became clear that the site, in fact, contained several Archaic period pit houses and adjacent work areas. The probability that this site would have been randomly selected for excavation from the NR-eligible lithic scatters at Abiquiu is, however, low (Stiger, no date, manuscript on file).

How frequently mistaken identifications such as this are made is, of course, difficult to calculate in any absolute sense. Nevertheless, there are ways of using our existing data, in New Mexico and elsewhere, to calculate some of the potential error associated with, for example, site size estimates (among other parameters). Provided that we make the effort to examine our CRM data in a critical, historical, and analytical fashion, we have a good deal of new and productive territory to explore.

In a similar vein, analysis of our Rio Arriba data indicates that a number of sites have not been visited in thirty years or more (a total of 274 sites, or 2.68 percent of all sites) (table 10.1). Furthermore, some of these sites have had no recorded visit for more than sixty years. Although the percentages represented by these data are relatively small, the distribution of these sites is again nonrandom, with significant clusters occurring in the southeastern corner of the county between Abiquiu and Española, in the Gallina and Navajo City–Gobernador areas, and a particularly dense cluster around Navajo Reservoir in the extreme northwest corner of Rio Arriba.

If we are evaluating the significance of a suite of sites, some of which were surveyed several times in the last decade, alongside sites without a recorded visit for more than forty, fifty, or sixty years, it seems prudent to account for these differences when evaluating which are eligible for the NR. Whether many sites can be found again, or even whether they still exist, must be an open question when the information we have in hand is more than half a century old. Furthermore, not only is the significance of these individual sites problematic, but so too may be any attempt to evaluate sites in their vicinity. Efforts to characterize the significance of single sites by reference to their regional context may be compromised considerably by the lack of quality information of any currency about sites in their immediate geographic vicinity.

Other details concerning the locational fidelity of our data are equally problematic. Of the 10,452 sites that we analyzed from Rio Arriba County (recorded

Table 10.1. Most recent visit/recording data for sites in Rio Arriba County, New Mexico, 1900–1995

Last site visit	Number of sites	Percentage of all sites
= 30 years ago and < 40 years ago	168	1.64
= 40 years ago and < 50 years ago	36	0.35
= 50 years ago and < 60 years ago	45	0.44
= 60 years ago	25	0.24
Total	274	2.68

Note: Of the 10,452 sites in our study, 245 of these do not have specific details concerning the chronology of site visits. The percentages above are therefore calculated using the figure of 10,207 (that is, 10,452 - 245).

between 1900 and 1995) only ten (about 0.09 percent) had, for example, their location recorded by using a global positioning system (GPS) instrument. Effective monitoring and management of archaeological heritage requires the requisite levels of precision and accuracy to ensure that when a site is revisited, we are clear that the field records from one visit relate to the same site as those from a subsequent visit. Without such precision, it is difficult to determine whether the locational information we have from different episodes of recording indicates that (a) the original site is larger (or smaller); (b) there are two or more sites present—rather than one; or (c) the original coordinates recorded for the site were erroneous.

The fact that we have precise GPS coordinates for a site does not necessarily resolve the question of what those coordinates mean or how they relate to defining the geographic boundaries of whatever cultural phenomenon we have identified on the ground. The *centroid* of a site (however defined), or various measured locations around a site's perimeter, for example, may mean very little if we do not know how those points were selected and the methodology/assumptions behind those choices. Is a site's boundary defined by absolute measures (such as the absence of any artifacts outside a clearly defined cluster of materials), or is it defined in a more quantitative fashion by diminishing densities of material? How do variations in ground visibility affect the size, shape, and discovery of sites? Seemingly small matters of detail of this kind have important implications for our stewardship of cultural heritage. Very few CRM reports that we are familiar with, at least, provide the type of specific information that would make it clear exactly how an estimation of size, for example, was arrived at. Combined with the poor locational precision and accuracy we have for many of our sites, both in Rio Arriba and the United States generally, the small number of visits many sites have received, and the rather unspecific documentation about key variables (such as site size), the quality of information we have available to evaluate and manage

cultural resources must often be regarded as lamentable. In this area, we can certainly do more and demand better quality.

It is certainly true that no set of archaeological data collected over a period of several years, decades, or centuries can hope to be absolutely comparable or without significant variations. However, since many of these variations are by no means trivial when evaluating the significance of cultural resources, it seems absolutely essential for us to be aware of the nature, magnitude, and spatial location of these resources. The appearance and development of large archaeological and heritage databases, especially those with spatial analytical capabilities in the form of geographic information systems (GIS) data, make the display and analysis of such attributes both rapid and straightforward. Whether sites in a potential impact area were surveyed five times between 1990 and the present or once in 1950 is obviously not without importance. The methods used to investigate and record these sites (essentially *archaeological metadata*) are equally critical and determine how far we can go in interpreting our evidence given its quality. Management of archaeological and other heritage resources in the absence of such data, and attempts to analyze and evaluate data quality, undoubtedly fall short of the best the profession can offer.

Archaeological taxa

As archaeologists, the contexts and language we use clearly matter, and nowhere more so than in our individual and collective decisions to assess significance, and thereby influence what remains of the archaeological record. Nevertheless, given the narrow parameters that have been used to address archaeological significance, it would be difficult to find an area of archaeological praxis where there is a more frustrating gap between objectives and application than archaeological taxa.

Despite widespread discussion over more than two decades, much of the terminology used to characterize archaeological significance, *and* archaeological sites generally, continues to be misleading, muddy, or profoundly confusing. These ambiguities are often veiled by reassuring dichotomies such as *significant vs. not significant,* or masked by catchall, nondescript categories such as *lithic scatters.* Those engaged in heritage management in a professional capacity, as well as other interest groups and the public at large, would be better served by adopting terms that more accurately reflect the conditional and imperfect nature of archaeological assessment.

It would be more accurate, for example, to label sites as *more* or *less significant* on a sliding scale, since their significance is subject to change through time and because arguably all sites have attributes that can be seen as significant (McMillan et al. 1977). Equally, more attention could be focused on what labels such as *lithic scatter* actually mean, that is, on a more specific characterization of

what it is (in compositional and functional terms) and its *size* and *location,* rather than simply dismissing such sites as ineligible with a minimum of investigation.

Without further discrimination, for example, the thousands of lithic scatters in our study area will remain lumped together in a homogeneous *catchall* category that is likely to ensure their extinction before we have even an inkling of what they are or their wider significance. If we allow small and less visible components to be winnowed from the extant archaeological record, the value and credibility of our discipline will decline accordingly. Consequently, the power and influence of terms that appear to be precise but create confusion rather than clarity, should be borne in mind, both for their impact inside and outside of the discipline.

Other aspects of archaeological taxa are an equally critical focus for all aspects of archaeological theory and practice. Take, for example, the dilemma of whether to record individual or isolated clusters of objects. Many patterns of human activity that have left traces on the landscape emerge only with some considerable reluctance, often over lengthy periods of time. Teasing out such patterns will require the patient accumulation of data from isolated locations and disparate recording episodes, evidence which is unlikely to make sense except in the longer term. Archaeologists normally comfortable with phenomena on the scale of centuries and millennia may find such timescales irritatingly inconvenient in the context of their individual career or life span. While it may seem that time and commercial development wait for no one, we do have methods and technologies to record such finds at low cost and high resolution, before the opportunity to interpret them is lost forever. What is less clear, however, is how much of this type of record will be sacrificed to the tidying tendencies of professional judgment and personal ego. It is equally unclear how well we will fare in attempting the more difficult task of placing such isolated materials in their wider spatial and historical context.

Despite a considerable body of literature devoted to the concept of sites, nonsites, and archaeological distributions (Goodyear 1975; Ebert 1981; Foley 1981a, 1981b; Thomas 1969, 1975; Dunnell and Dancey 1983; Bintliff and Snodgrass 1988; Rhoads 1992), the site concept remains an elusive one. The issues raised by this continuing conundrum affect archaeological management and significance evaluation, along with the discipline as a whole.

Although the notion of a siteless landscape, punctuated by artifact clusters of variable density, is an innovative and elegant proposition in the minds of many archaeologists familiar with the reality of such phenomena in the field and on their computer screens, such ideas have had less positive traction in the heritage management arena. The issue of what a site is, and is not, remains important and awkward for research and management alike, as is the question of whether a site is significant or not. Like nested Chinese boxes, these are related and dependent questions that remain open.

The need to determine the significance of larger (landscapes) and smaller (isolated objects or IOs) phenomena further clouds and complicates the archaeologist's task of attributing significance to cultural remains. At both ends of the size spectrum, time and further investigation often reveal characteristics that change our view of landscapes (such as the recent discovery of new enclosures near the West Kennett Long Barrow in the Avebury area; Pomeroy, this volume), or our understanding of IOs and their relationship to sites and activities in the surrounding area. In New Mexico, where the site density is very high indeed, the identification of IOs often seems more an act of belief than of science, since little attempt is made to understand what such objects are, what relationship they have with their surroundings, and whether there is meaningful patterning associated with them (for example, with respect to raw material, spatial location, function, or chronology).

Returning to the issue of sites and their definition, the use of terms such as *lithic scatter* obviously has important implications for what we preserve or discard, and consequently understand, of the existing material record. Tainter (1979), for example, analyzed the Mountainair (New Mexico) lithic scatters in an attempt to look more deeply into what we mean by this catchall category and tried to provide some methodological tools for improving our approaches to this type of archaeological resource. The prevalence of such sites (and this term) in New Mexico is formidable, since lithic scatters constitute the vast majority of the prehistoric record here. Consequently, the need to understand differences among sites placed in this category is clear.

In this context, management without research and analysis will continue to populate the archaeological record of New Mexico and other regions of the country with sites that we dimly understand, and discard at our peril (witness the example from Abiquiu, referenced above).

Our analysis of the Rio Arriba data for the period from 1971 to 1995 suggests that the definitions of an archaeological site in use at this time (at least in Rio Arriba) were not as static and well defined as we might have been led to believe. The graph in figure 10.6 emphasizes that a major shift in the size of sites being reported took place around 1982, when the proportion of large sites (more than 1,000 square meters) reported overtook that of small sites (that is, those with less than 1,000 square meters).

The timing of this change is significant and in many ways counterintuitive for several reasons. First, it is logical to think that the reported proportion of large sites in Rio Arriba County should have diminished through time, as the more visible sites were found first, and more rigorous surveys (with more labor expended per unit area) that could detect smaller, less visible sites with more dispersed materials occurred later. Second, and perhaps just as important, the late 1970s and early 1980s were periods when much research on small sites, nonsites, and distributional landscapes was being presented in the literature, especially the work of Lewis Binford and Jim Ebert (both from the University of New Mexico).

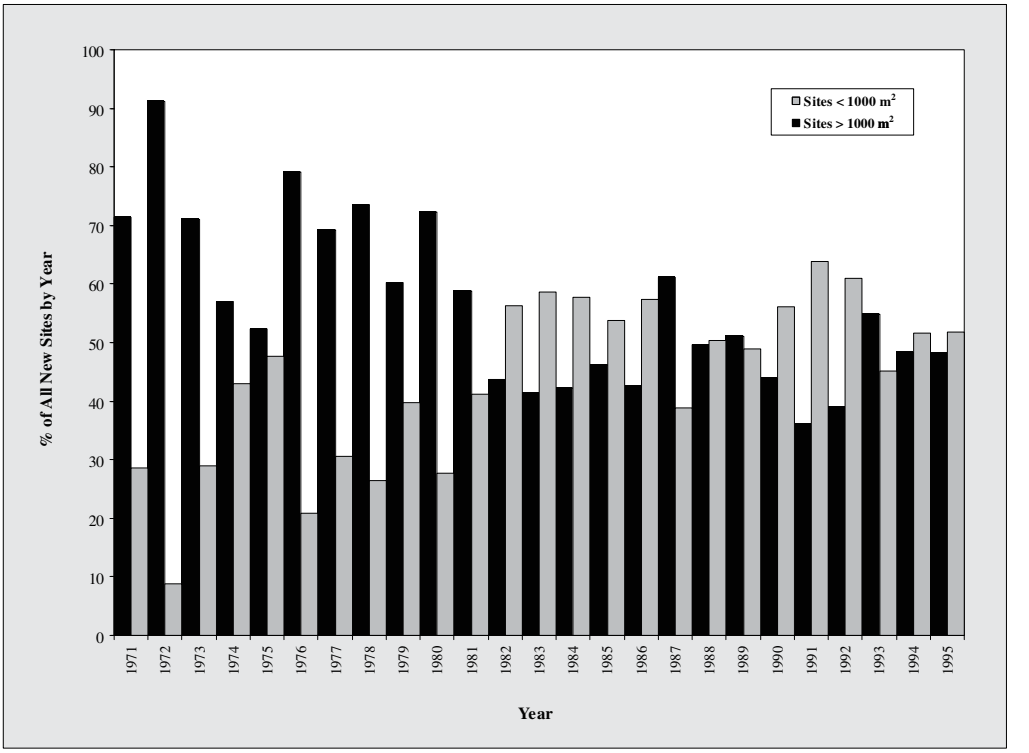

Fig. 10.6. Comparison of the frequency of sites < 1000 sq meters in size with those > 1000 sq meters in Rio Arriba County, New Mexico, 1971–95.

This research by both Binford and Ebert (for example, Binford 1976, 1978, 1980, 1982; Ebert 1981) clearly had a significant influence on work undertaken in Rio Arriba County and in other areas in the Southwest at this time (Anschuetz et al. 1990; Camilli et al. 1988; Doleman et al. 1991, 1992; Seaman et al. 1988; Wandsnider and Camilli 1992).

Although the precise reasons for this patterning are not yet clear and are being investigated currently, two possibilities are that archaeologists conducting work in Rio Arriba county were (a) lumping sites together to make them more likely to be classed as NR eligible (a "safety in numbers" approach) or (b) lumping together small sites to minimize the amount of field recording time (that is, completing one site record form instead of multiple forms).

Two contrasting site definition strategies, "lumping" versus "splitting," are represented schematically in figure 10.7.

Whatever the reason or combination of reasons for the patterns of site size and discovery displayed in figure 10.6, it is clear that assessments of site significance and approaches to heritage management need to monitor, and be sensitive to, changes in archaeological practice. Without such awareness, we could be making

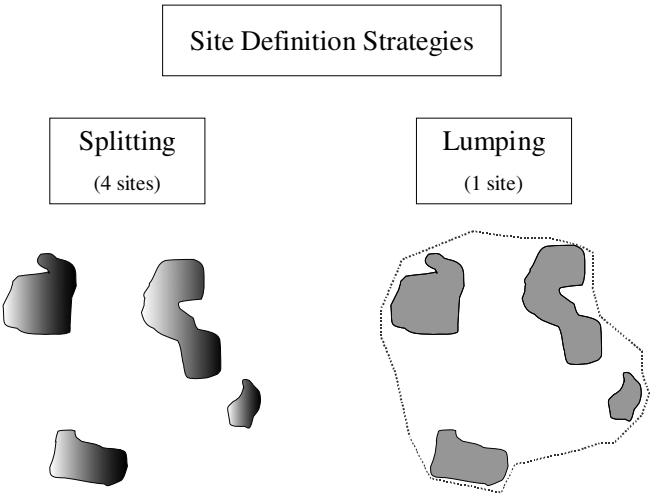

Fig. 10.7. Idealized site definition strategies.

assumptions about the nature of the archaeological record that are independent of the choices and strategies being adopted by archaeologists themselves. In this case, it is unknown whether the trend visible in figure 10.6 is a genuine increase in the proportion of large sites being found, or if it simply represents a major change in how archaeological sites were being defined. Which of these two alternatives is correct has important implications for managing and preserving archaeological sites in New Mexico and elsewhere.

Matching analytical tools and archaeological concepts

There is a clear need for archaeologists, and others, to match the relative and dynamic nature of the significance concept with appropriate analytical tools and approaches, particularly ones that are capable of keeping pace with rapid changes in society, scientific knowledge, and values.

Although many traditional approaches to archaeological significance are limited in scope, logistical support for more holistic analyses have also been lacking until recently. In the face of major pulses in commercial development and archaeological research, traditional paper and pen approaches, which include aspatial databases and variable recording procedures, have fallen well short of the best practice objectives outlined more than twenty years ago in the literature. Since that time, however, a wide variety of analytical tools have emerged with the potential to expand considerably the size, depth, and breadth of the data set used to evaluate significance (Aldenderfer and Maschner 1996; Allen et al. 1990; Clark 1990; Behrens and Sever 1991; Gaffney et al. 1991; Conyers and

Goodman 1997; Lock and Stancic 1995; Maschner 1996; Scollar et al. 1990; UNESCO 1996).

The dynamic character of the archaeological record is clear from our study of Rio Arriba County, for example, where more than several hundred sites (on average) are found each year. In the state of New Mexico as a whole, the total number of new sites averages more than 5000 annually. While archaeologists are increasingly aware of the contingent and relative nature of archaeological significance and the criteria used to evaluate it (Leone and Potter 1992; Darvill 1995; Pearson and Sullivan 1995; Carman 1996; Carver 1996; Smith and Clarke 1996), we should not overlook the fact that our data are highly dynamic, too, from the details relating to individual sites to information collated at an international scale. Although we may agree that our concepts and assessments of significance need to be flexible and sensitive to change, in general, the tools and approaches we are using currently to evaluate significance are not.

Clearly, GIS, remote sensing, geophysical techniques, and other more recent additions to our analytical toolkit are simply tools to be used, abused, or neglected. Nevertheless, their prudent and more widespread use has the potential to significantly increase our flexibility and opportunities for addressing the dynamic nature of archaeological significance (Groenewoudt 1994; Wheatley 1995). Modern tools and regional geospatial databases, however, are not enough. While they represent steps toward a wider and more informed view of archaeological value and significance, we need to have the wisdom, foresight, and analytical rigor to use these tools more creatively.

Vandalism in context

With good reason, archaeological discussions of significance and value have historically tended to focus on the proactive and positive steps we as a profession can take in our role as stewards of cultural resources and our collective patrimony. No discussion of archaeological significance would be complete in our view, however, without examining those forces that work in precisely the opposite direction, that is, to damage and destroy sites, intentionally, by accident, or through neglect. Vandalism, or the deliberate targeting of cultural resources for profit or malicious destruction, is the most insidious and pernicious of these, and has long been the bane of archaeologists and other heritage professionals. It is somewhat surprising therefore that vandalism has often been left out of discussions regarding significance.

With only a few notable exceptions (Schiffer and Gumerman 1977; Nickens et al. 1981; Christensen et al. 1988; Spoerl 1988; Nickens 1991; Ahlstrom et al. 1992; Lentz et al. 1996), discussions of vandalism and other major impacts to cultural resources seem to devote considerably more attention to the description and legal framework of preservation than to the systematic analysis of the phenomenon itself. Vandalism clearly has complex roots and manifests in a variety of

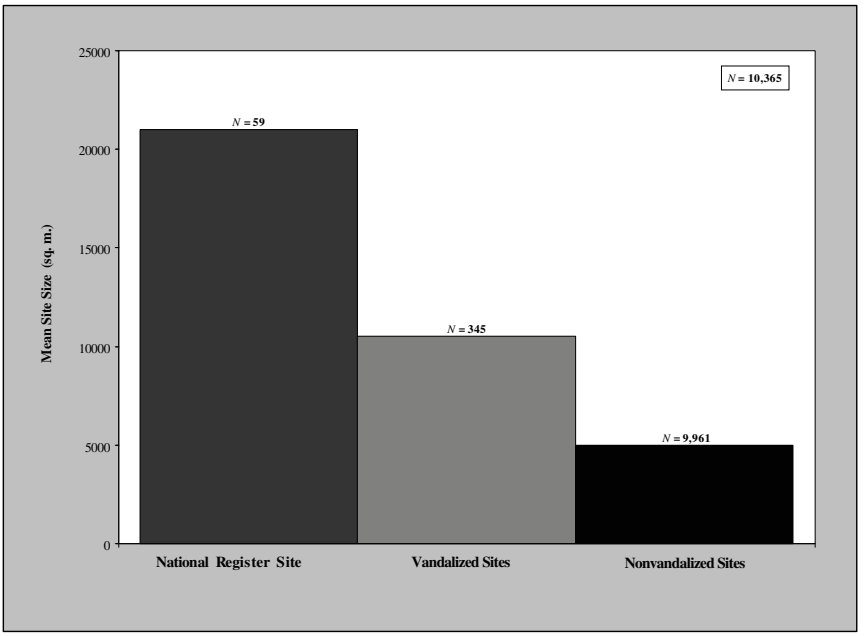

Fig. 10.8. Mean size data for National Register, vandalized, and nonvandalized sites in Rio Arriba County, New Mexico, 1900–1995.

different guises. Although there is a spectrum of activities, from the relatively random defacement of rock art to the systematic looting of cemeteries, assumptions about the targets and perpetrators of vandalism seem to be more common than attempts to understand this form of human behavior in a more comprehensive fashion through analysis.

Our Rio Arriba data provide a number of insights into vandalism, significance, and monitoring strategies that are worth pursuing in more detail. Only a few of these are reported here as illustrations of the potential value of investigating these subjects further. First, it is clear that vandalized sites fit into a very specific size cohort with respect to other site types, with large National Register resources at one end and smaller, nonvandalized sites at the other (figure 10.8). The targets of vandalism in Rio Arriba County, at least, appear to occupy a type of *Goldilocks* position; that is, they are not too large and not too small either. One possible explanation for this patterning is that large sites might attract too much attention and too many visitors to be attractive targets for systematic vandalism, whereas smaller sites might be insufficiently interesting or productive. Since the sites that constitute the preferred targets of vandalism here fall within a rather specific size range, this information (in combination with other variables) can help us predict not only what areas need regular monitoring but also where the next focus of vandalism is likely to be. If we are interested in long-term

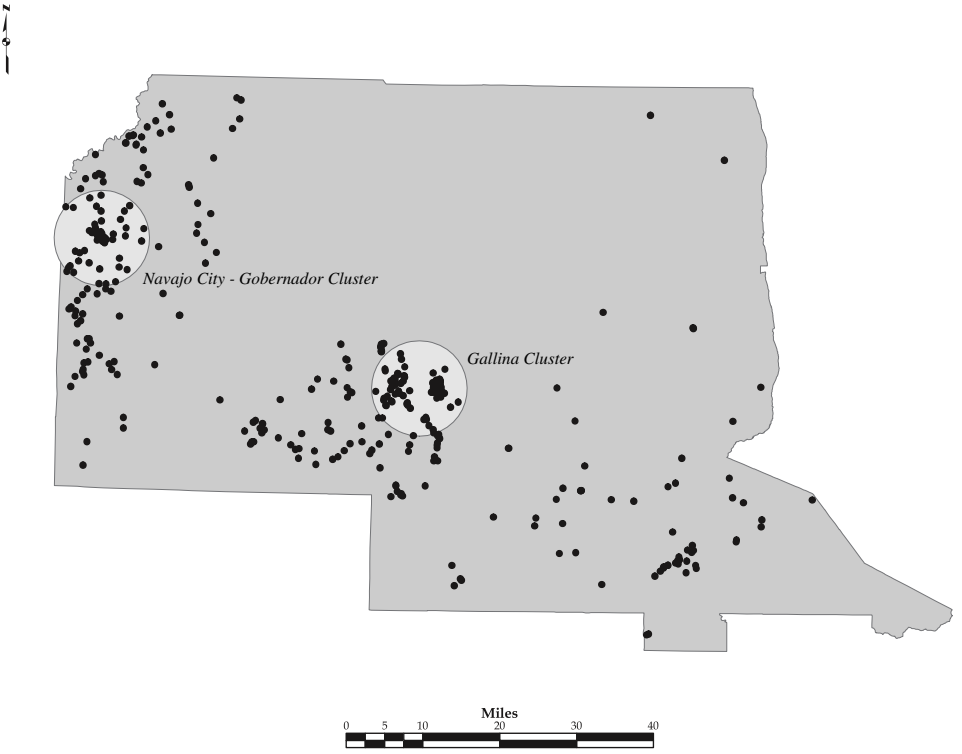

Fig. 10.9. Distribution of vandalized sites in Rio Arriba County, New Mexico.

assessments of significance and effective heritage management, details of this type will be of considerable importance.

Another valuable result from our analysis of data from Rio Arriba suggests that the spatial concentration of vandalism on a regional scale is rather pronounced. Figure 10.9 illustrates the overall number and distribution of vandalized sites in the county and highlights two major clusters: (1) focused on the Gallina area, a region known for a rich series of Pueblo III and Pueblo IV defensive settlements (Cordell 1989); and (2) the Navajo City–Gobernador area, which is characterized by a very high density of prehistoric sites, including occupation contemporary with the main Chacoan expansion (Powers and Johnson 1987; Vivian 1990). The ring buffers surrounding the main concentration of sites within each cluster form only 4 percent of the surface area of Rio Arriba County. As of 1995, however, these buffers contained some 39 percent of the total number of vandalized sites from this region.

Taken together, these data suggest that specific geographic areas, site size ranges, and chronological periods are the consistent focus of vandalism in Rio Arriba County. Because of the quality of information recorded by the Archaeo-

logical Records Management Section (ARMS), which maintains a geospatial database at the New Mexico SHPO, a great deal more discrimination and analysis is possible by, for example, focusing on different types and levels of vandalism, degrees of physical access, and regional site aggregation.

By attempting to understand some of the different dimensions of vandalism and their manifestations at different scales, archaeologists will be in a much better position to fashion educational, monitoring, and other more effective heritage management strategies. If we are to have sufficient time to explore significance at a local, regional, and inter-regional scale, the protection of known cultural resources and resource areas is essential.

Conclusion: Looking forward

As interpreters of past societies and cultures, we have a responsibility to them, to the communities we live in, and to successive generations; we owe all of these constituencies, past, present and future, the best we can offer. We have argued that best practice in the context of heritage management is difficult and problematic to define if we do not take the measure of it (past and present) in a rigorous, historical, and self-critical way. More innovative and responsible strategies for managing heritage depend to a large degree on our humility, imagination, and analytical rigor.

Work that is elsewhere referred to as the "Accounting School" of archaeological significance evaluation (for example, Carman 1996, this volume, Carman et al. 1999), for example, can be seen on the one hand as the rather mechanistic application of selective assessment criteria. The use of *shopping lists* of variables to define significance clearly results in evaluations that are neither comprehensive nor definitive. The dynamic nature of significance, emphasized by much of the past archaeological literature on the subject (for example, Tainter and Lucas 1983; Leone and Potter 1992), ensures that this is so and will continue to be in the future. On the other hand, explicit trait lists designed to better delineate significance, many of them purposefully tailored to the characteristic features and issues of localized areas, continue to be used (for example, Whitelaw, this volume). Whether these approaches are always as satisfying or holistic as they should be, explicit statements of assessment criteria are amenable to scrutiny, critique, and discussion. Implicit assumptions and criteria, on the other hand, are not as easily teased out of contemporary archaeological practice. Future historiographic analysis of archaeology and heritage management will find it no easier to determine what bases we used for selectively preserving and destroying components of our cultural patrimony.

The point we are emphasizing is that *accounting* and *accountability* have the same roots, and that in our role as stewards of cultural heritage, we play an important part in determining what survives of the extant archaeological and historical record. At any one time, the choices and criteria used to manage our

heritage are no more divorced from the living, contemporary culture in which we live than any other aspect of that culture. The dependent, culture- and class-bound nature of significance criteria is clear, and is manifest in the altered priorities of preservation management when seen from an historical perspective (for example, witness the examples emphasized by Funari, Whitelaw, and Smith, this volume).

In our efforts to fashion new approaches to significance, it is important that we acknowledge our imperfect ability to corral this difficult and dynamic phenomenon. From this perspective, debates about whether our significance checklists and evaluation criteria are definitive will never be conclusive. A more productive strategy, however, (one that emphasizes *accountability*) is to ensure that we provide more overt statements regarding what is (and is not) heritage of value, and why. By making archaeological assumptions about significance more transparent, we are *attempting* best practice, but at the same time recognizing that we can do better. With theory and method more accessible, our ideas will be more amenable to discussion, critique, public accountability, and, ultimately, *change*.

Such an approach has much to reveal about ourselves and how we work, and about the history of archaeology, anthropology, and heritage management in their wider cultural and historical context. There is already a great deal of material for historiographers of archaeology and heritage management to work with and to reveal about what we have done with the archaeological record in the past, as well as the effects of our current practice. After all, what we as a society value as heritage, or at least what certain influential members of a society value and protect, has much to say about contemporary values (material and nonmaterial), as well as power relations, diversity, and other key elements of culture in its broad sense.

The potential value of this information will not be lost on future generations of historians or historiographers, whether their interests lie in historically based social sciences such as history, anthropology, and archaeology, or in cultural dynamics generally. Rather than wait for retrospective analyses of what we have done, we have the data, tools, and some of the approaches to begin using and analyzing this information ourselves. Self-reflexive and self-critical historical approaches have their place in archaeology and heritage management, as they have had, profitably, elsewhere in allied disciplines such as history (Trouillot 1995), anthropology (Barrett 1984), and geography (Harvey 2000). Although a number of general histories of archaeology and heritage practices have been offered since the emergence of cultural resource management (for example, Lowenthal 1988, 1998; Trigger 1989; Stiebing 1993; Pinsky and Wylie 1995; Wallace 1996; Rosenzweig and Thelen 2000), few of these discuss the major contribution of CRM to the development of American archaeology or heritage management (however, see Kehoe 1998 and Kehoe and Emmerichs 2000).

When seen from a historical perspective, the data from Rio Arriba County provide some insight into the practice of archaeology and heritage management

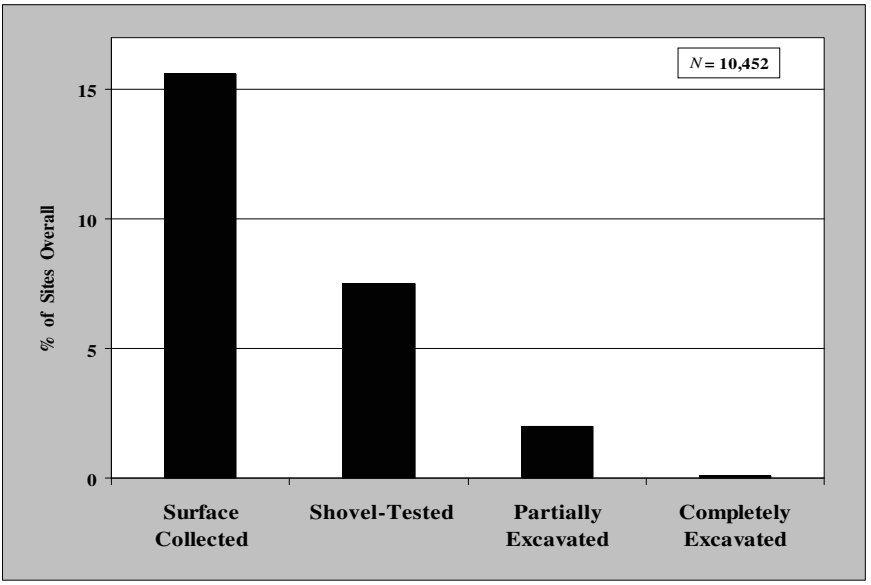

Fig. 10.10a. Methods used in archaeological site investigation in Rio Arriba County, New Mexico, 1900–1995.

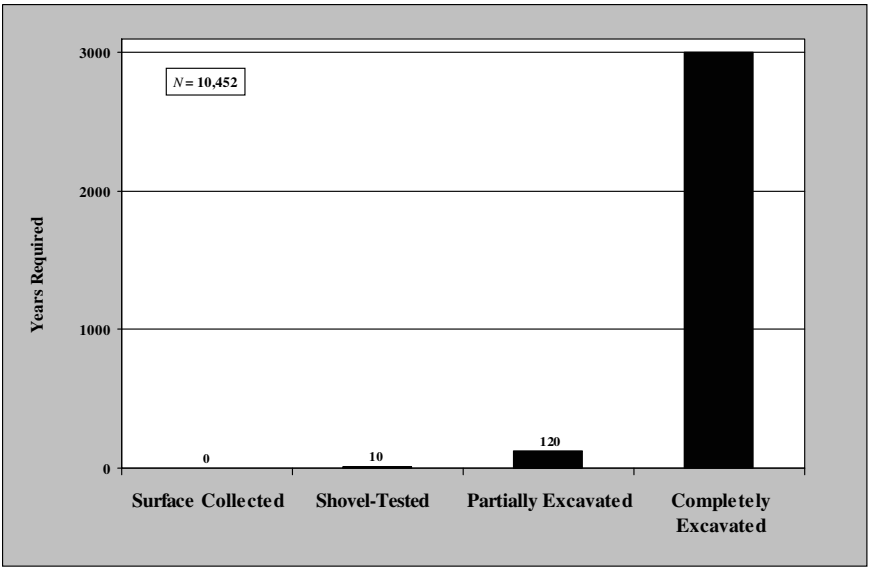

Fig. 10.10b. Years required to achieve a 10 percent sample of sites using different site investigation techniques, Rio Arriba County, New Mexico, 1900–1995.

specifically: where we have been, what we have selected to preserve, where we have focused our investigations, and what fruit those choices have borne. In figure 10.10a, we take stock of the different methods that were employed in the past to investigate archaeological sites, and in figure 10.10b, we suggest how long it will take (at this pace) to investigate a 10 percent sample of our sites using these different methods.

While it may appear that the goal of achieving a 10 percent sample of completely excavated sites is an unachievable fantasy, these graphs do, nevertheless, provide some insight into the scale and magnitude of the task before us. The more realistic goal of achieving a 10 percent sample of *partially* excavated sites is 120 years away in Rio Arriba, given our current progress on this front. Importantly, this figure assumes that no other archaeological sites will be found during this period, and, equally, that none will be destroyed. Clearly, both of the latter assumptions are unfounded, since damage to, and destruction of, our heritage will continue, as will the recovery of large numbers of new sites. More humility and analytical rigor in the face of such data seems appropriate.

Likewise, how much we know about *existing* sites is also an open question. Work in the last decade at the famous Bronze Age site of Troy is one prominent example of how even well-known sites still have significant surprises for us, even after a century of major investigation. Recent excavations and geophysical work at the Late Bronze Age site of Troy in western Turkey (Blindow et al. 2000; Korfmann 2000) have revealed a causewayed ditch that appears to enclose a previously unsuspected urban area below the well-known royal citadel. This fortified area covers approximately twenty hectares, expanding the size of the citadel excavated by Schliemann (1881) by a factor of ten.

Our purpose here is not to emphasize the difficulties of dealing with poorly documented, inadequately sampled, or simply unknown data sets, since these features of archaeology will be perpetual. Instead, we suggest it is critical for the health of archaeology generally, and heritage management in particular, to approach the variability we see in the cultural record in a less normative way. In particular, we suggest that there is a need to focus attention on the impacts archaeologists have had in choosing to investigate some geographic areas but not others, and in preserving some types of sites while sanctioning the destruction of others. Although considerable energy and attention has been focused on modeling both past and future conditions in archaeology (that is, predictive modeling in forward and reverse gear) (for example, Kvamme 1983; Limp and Carr 1985; Kohler and Parker 1986; Sebastian and Judge 1988; Warren 1990), there is a pressing need to examine the impact of our assumptions, methods, and policies on what remains of the archaeological record. While the choices we make and the strategies we adopt will not be without flaws and problems, being accountable for our actions (and their impacts) should help to improve the debate, dialogue, and awareness about heritage management and archaeology, both within the discipline and among the public at large.

By implementing these types of approaches, we believe that a more expansive vision and understanding of archaeological significance will emerge, one that is anchored solidly by an emphasis on multiscalar, self-critical, and historical analyses. Such an approach has important implications for both basic research and heritage management, and will make some progress toward dissolving the artificial dichotomy between them. The rapid rate of data accumulation and landscape alteration, as well as our growing community and legal, ethical, and educational responsibilities, make it imperative for archaeology to make progress in closing this gap.

In addition, more broadly based analyses of context will considerably improve not only our understanding of archaeological significance but also of our general heritage, both cultural and ecological. In Rio Arriba County, for example, we have tried in a very pragmatic way to see archaeological significance as inextricably linked with other socially valued resources. In one case, we have been investigating the overlap between archaeological sites and endangered species habitats in order to provide a broader basis for evaluation, management, and community decision making. Analyses of this kind are not only feasible but critical if as a society we are to balance the importance of archaeology alongside other competing social values. The development of a more holistic approach to value and significance, one that places archaeology in the context of other valued phenomena (such as endangered plants/animals and fossil beds), is essential as the nature of heritage management expands to include new issues and resources.

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We also thank Susan Duhon, our copy editor, for her useful suggestions and adjustments.

Any remaining errors or flaws in logic we will try to blame on one another.

The views expressed here are our own and are not intended to reflect the policies, practices, or views of our employer, the U.S. Army Corps of Engineers.

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Significance in American cultural resource management

Lost in the past

Jeffrey H. Altschul

Introduction

In the current practice of cultural resource management (CRM) in the United States, the concept of significance has a precise legal meaning. Title 36, Part 60, of the Code of Federal Regulations (36CFR60) establishes the criteria to assess a property's eligibility for listing in the National Register of Historic Places (NRHP). The regulation states that it is the "quality of significance in American history, architecture, archaeology, engineering, and culture is present" in a property, along with its association with (a) an event; (b) a famous person; (c) a type or master; or (d) information potential, that makes the property eligible for the NRHP (36CFR60.4). The importance of this designation is that the National Historic Preservation Act (NHPA) requires federal agencies to consider the effects of their undertakings on NRHP-listed and NRHP-eligible properties and, to the extent possible, minimize adverse effects. It is under these auspices that most historic preservation in the United States is performed.

The NHPA was passed in 1966, and in the intervening years the procedures for determining the significance of archaeological sites have become well established. A bureaucratic approach has emerged that incorporates archaeologists working for federal, state, and municipal agencies as well as those employed as consultants for private and public entities. The importance of an archaeological site is evaluated in relation to specific research questions commonly phrased as hypotheses. This framework, which emerged from the prevailing intellectual milieu, worked well for many years. It is the thesis of this paper, however, that this approach has increasingly stymied archaeological research, imparting a false rigor to CRM work, which has become largely locked into culture history and processual questions.

Significance as defined by the National Register

Of the four NRHP criteria, the one most often used for archaeological sites is criterion d, which states that a property is eligible for listing in the NRHP if it has "yielded, or is likely to yield, information important in prehistory or history" (36CFR60.d). Much of the discussion about significance among archaeologists over the last thirty-five years has focused on what is important, how such values are defined, and how one recognizes these values in an archaeological site (see Briuer and Mathers 1997). Of central importance to this discussion is how this criterion is interpreted by federal regulators. The National Register Branch of the National Park Service (NPS) is charged with the responsibility of interpreting the regulations. Its interpretation of criterion d (NPS 1990: 21) is as follows:

> Criterion D most commonly applies to properties that contain or are likely to contain information bearing on an important archaeological research question. The property must have characteristics suggesting the likelihood that it possesses configurations of artifacts, soil strata, structural remains, or other natural or cultural features that make it possible to do the following:
>
> - Test a hypothesis or hypotheses about events, groups, or processes in the past that bear on important research questions in the social or natural sciences or the humanities; or
> - Corroborate or amplify currently available information suggesting that a hypothesis is either true or false; or
> - Reconstruct the sequence of archeological cultures for the purpose of identifying and explaining continuities and discontinuities in the archeological record for a particular area.

The three features listed above are a curious mixture. Hypothesis testing is the cornerstone in the experimental method as used by Western philosophy and science. Placing past events in their correct sequence without necessarily explaining the underlying social processes is the domain of humanistic history. The two approaches seemingly have little in common; so why do both figure so prominently in modern CRM? To answer this question, we must look at the history of American archaeology.

The marriage of culture history and processualism in CRM

Although significance as practiced today in CRM was codified in historic preservation law in the 1960s, the concept has long been used in American archaeology. For most of the nineteenth century, American archaeology was the domain of antiquarians, who were interested primarily in obtaining and studying artifacts of museum quality. The adoption of scientific principles to guide archaeological research, which began in the early twentieth century, marked a dramatic shift

from viewing sites as containers of objects to vessels of information (see Willey and Sabloff 1993). Sites began to be excavated less to find things and more to provide answers to questions.

For the first half of the twentieth century, American archaeologists focused almost exclusively on culture history, the sequence and spatial extent of cultures in a region (Lyman et al. 1997). This type of research may have reached its zenith in the 1930s, when the United States went through its first major experience in archaeological research sponsored by non-research-related government agencies. At the height of the Great Depression, millions of dollars were spent on archaeology, mostly in the capacity of jobs programs sponsored by agencies such as the Works Progress Administration (WPA), the Tennessee Valley Authority (TVA) and the Civilian Conservation Corps (CCC). In 1939 alone, the WPA sponsored thirty-two archaeological projects at a cost of approximately $2,000,000 (Lyons 1996: 71).

Depression-era federal archaeological programs were generally supervised by a board of archaeologists and administrators in Washington, D.C. Proposals were evaluated on a variety of criteria: the unemployment rate in the targeted county; the number of jobs that would be created; and, with perhaps not quite the same weight, the importance of the archaeological research. The Louisiana Project was typical of WPA archaeological programs. Created by James Ford in 1937, the Louisiana Project was designed to flesh out the culture history for the lower Mississippi River valley. Ford, who had been working in Louisiana since childhood, speculated that three prehistoric cultures, Marksville, Coles Creek, and Mississippian, developed in the region (Ford 1936). He proposed to demonstrate this sequence by peeling back key mound sites in the lower Mississippi valley. Ford's methods proved remarkably successful. By matching stratigraphic sequences between sites he discerned more periods in prehistory than previously anticipated. The WPA allowed Ford to follow these leads, with the result being the discovery and temporal placement of the Tchefuncte, Marksville, Coles Creek, Mississippian, and Plaquemine cultures (Ford and Willey 1941). In four years, Ford created a cultural chronology for one of the world's great river systems, a cultural framework that in broad outlines lasts to this day (Willey and Phillips 1958).

The WPA and other depression-era programs did not use the term significance, but it is clear that site selection was based on perceived importance to regional culture history. Sites that filled gaps in the sequence were targeted for investigation. These tended to be large, complex sites. Small, ephemeral sites were ignored because archaeologists believed they had little to contribute; in other words, they were not significant.

Culture history continued to dominate American archaeology throughout the 1950s, although new voices began to point out the school's theoretical limitation (Taylor 1948; Willey and Phillips 1958). The discipline was ripe for a new approach to the study of past. It came in the early 1960s.

The New Archaeology ushered in many changes in the conduct of American archaeology. Interest shifted from regional culture history to explaining human behavior. Although the debate over proper conduct of archaeological inquiry was vigorous, one approach in particular had a dramatic influence. In a series of papers, Lewis Binford advanced the hypothetico-deductive explanatory framework as the most appropriate for archaeological research (for example, Binford 1962, 1968). The lasting influence of this line of thought has had less to do with its philosophical underpinnings than with its emphasis on problem-oriented research and the advocacy of formal hypothesis testing.

Archaeologists had been designing research programs to address "problems" for most of the twentieth century. As described above, Ford led his team in Louisiana in a concerted effort to flesh out the culture history of the lower Mississippi River valley. To the New Archaeologists, however, problems of culture history were not scientific problems. As Binford (1972, 22) stated, "Specific 'historical' explanations, if they can be demonstrated, simply explicate mechanisms of cultural process. They add nothing to the explanation of the process of cultural change and evolution." Problems of interest were understanding the underlying principles governing human behavior. Individual archaeological studies were useful not in the particulars of the artifacts or features, but only in light of how these assemblages could test general principles of behavior.

The framework for scientific inquiry advanced by Binford and his colleagues was a formal approach to hypothesis testing developed by philosophers of science, particularly Carl Hempel (1965). Although two modes of scientific inquiry were recognized—inductive and deductive—primacy was given to deductive reasoning. Inductively based research, by which the cumulative weight of many scientific tests lead to the discovery of an underlying general principle, was judged inferior to a deductive approach of starting with a general principle or law, constructing a theory based on the law, and then formulating a hypothesis that could be tested with empirical data (Watson et al. 1971).

Archaeologists struggled with putting the concepts of the New Archaeology into practice. The Tehuacan Valley project exemplifies this struggle. Richard MacNeish was interested in understanding the origin of agriculture in the New World. After a number of attempts to pinpoint the likely center of domestication, MacNeish settled on the highlands of central Mexico, and chose the Tehuacan Valley to study (MacNeish 1967a, 1967b). Under his guidance, sites were selected for excavation and analysis. Using these and other data, Michael Coe and Kent Flannery (Coe and Flannery 1964; see also Flannery 1968) developed a model of the origin of agriculture and presented it in a deductive framework. Their use of systems theory was highly influential, focused on the processes involved in culture change as opposed to events, and was part of a series of studies that led to the processualist school that came to dominate American archaeology in the 1970s.

MacNeish's work melded together parts of new and old approaches to ar-

chaeological research. In the best tradition of Ford and his colleagues, MacNeish doggedly and systematically zeroed in on his target by piecing together the results of field research to select a region and sites in that region to study. He diverged from his predecessors by focusing not on regional culture history, but on a problem of singular importance in cultural evolution. MacNeish and his colleagues did their best to utilize aspects of the hypothetico-deductive explanatory framework, although in hindsight, the theoretical structure of the argument seems forced, and of little importance to their inferences.

The passage of the NHPA came during this intense and often contentious period of intellectual discourse about the nature of American archaeology. Culture history and problem-oriented hypothesis testing stood side by side as dominant and, apparently, mutually exclusive research frameworks. Significance prescribed in the law became a reflection of the prevailing schools of thought. The melding of research problems, hypothesis testing, and culture history was much like a shotgun marriage. The law required archaeologists to define significance, and these were the various approaches on the table.

Whereas academic archaeology in the United States has moved on to embrace a variety of theoretical approaches, including post processualism, world systems theory, landscape archaeology, and the archaeology of mind, CRM has remained tethered to a concept of significance that embraces, but does not integrate, problem-oriented research and culture history. To understand how this historical artifact has affected CRM, I turn to a discussion of how significance is used in practice.

Significance in practice

The significance of an archaeological site is taken into consideration at two points in the process by which federal agencies comply with the NHPA. The first occurs during the initial assessment of a site. For projects involving federal funds, permits, or licenses, the area that will be affected is inventoried for historic properties. Generally, inventories involve an archaeological survey, but they may also incorporate other techniques, such as remote sensing or shovel tests, as dictated by local conditions. The archaeological sites documented through this process are evaluated for potential listing in the NRHP. Only significant sites (that is, sites with data that can address research problems or fill in cultural historical sequences) are eligible for the NRHP under criterion d. Defining pertinent research issues, termed "historic contexts" by the NPS, should take place prior to the survey, and certainly before the evaluation. In many regions of the United States, historic contexts have been developed on regional scales, usually under the auspices of State Historic Preservation Offices (SHPOs) or Tribal Historic Preservation Offices (THPOs). Sometimes it is possible to evaluate a site based solely on surface observations, but in many cases a second phase of fieldwork involving limited test excavations is needed.

The bar of significance is set relatively low at this juncture of the compliance process. Historic contexts by nature are broad and imprecise. For example, one historic context prepared by the Arizona SHPO involved prehistoric nonirrigation agriculture (Doyel 1993). The context defines a series of research topics including the types of nonirrigated agriculture, the various crops, the origins of Southwestern agriculture, and the evolution of regional agricultural traditions. According to Doyel (1993: 39–42), property types that could inform on these questions range from lithic scatters to villages. Most prehistoric sites with reasonably good integrity can easily be argued to potentially contain data that bear on one or more of these questions. It is not surprising, then, that many archaeological sites are considered significant.

The second time the significance of an archaeological site is considered in the compliance process is during the development of treatment plans. Once a site has been determined eligible for listing in the NRHP, the federal agency and the SHPO/THPO evaluate the proposed impacts of the project. Usually, they come to an agreement concerning how the site will be treated, which is formalized in a document termed a Memorandum of Agreement. Significant archaeological sites that cannot be avoided are generally subject to data recovery, which includes excavation, analysis, a technical report, and curation of the artifacts and project materials. The agency, often through a consultant, prepares a treatment plan that commonly consists of a research design, plan of work, schedule, and level of effort. In the research design, the agency forwards an argument that ties the site to particular research problems. Often these are stated in a hypothesis testing format, with theoretical propositions advanced, hypotheses developed, and test implications for the particular site presented. Even cultural historical issues are commonly presented in this format. The research questions are then linked to a plan of work that presents appropriate field and analytical approaches. Compliance is achieved by meeting the stipulations of the agreement document, which includes executing the treatment plan.

Problems with significance

The compliance process described above has evolved over thirty-five years into a familiar routine. Perhaps not surprising given that large federal and state agencies are involved, compliance with the NHPA follows formal, bureaucratic procedures. All parties, which include federal agencies, SHPOs/THPOs, Native American groups, and consultants, have roles that are consistent and predictable.

The effect is a stilted and rigid approach that is not conducive to creative and innovative thinking. Historic contexts for prehistoric resources tend to be quite similar, focusing on topics such as subsistence, settlement, and cultural affiliation. The same types of resources are found significant, leading to the repeated excavations of similar archaeological sites. In a review of the Bureau of Reclamation's Central Arizona Project, W. James Judge (personal communication 1992)

asked rhetorically how many more pit houses or unit pueblos archaeologists had to dig before they recognized that little new was being learned. There was no clear answer; yet, it is exactly these types of residential sites that continue to be excavated by CRM archaeologists asking generally the same questions. The net result is a small increase in our knowledge of culture history, but little, if any, advance in social theory.

To change this situation, we must encourage more varied and diverse approaches to the study of the archaeological record. Significance as defined under criterion d is not an inherent quality of an archaeological site, but instead is based on what we can learn from it. Our evaluation of a site is shaped by theory. It is the investigator's role to define variables of theoretical concepts that can be observed in the archaeological record. Archaeological manifestations that have measurable attributes of these variables can then be used as test cases. It is this logical argument that makes an archaeological site significant. There is nothing inherent in the law that prescribes a particular theoretical approach, although in practice culture history and processualism have dominated the stage. To change this situation requires that we open the process to competing theoretical frameworks.

I will illustrate how using a different theoretical framework might affect the compliance process with an example from Arizona. I have chosen landscape theory for this discussion. Because my focus is on significance, I only discuss the theory in relation to its impact on the compliance process. The reader is referred to more comprehensive treatments for a full discussion of landscape theory (Crumley and Marquardt 1987; Whittlesey 1998a, 1998b; Zedeño 1997; Zedeño et al. 1997).

Patterns in the pavement: The cultural landscape of the western Sonoran Deserts

In 1999, Statistical Research Inc. (SRI) surveyed just over 4,000 hectares of the U.S. Army Yuma Proving Ground (Vanderpot and Altschul 1999) (figure 11.1). Located in the western Sonoran Desert, the project area is characterized by a series of Pleistocene ridge systems. The nearest permanent water source, the Gila River, is located about fifteen kilometers to the south. The surface of each ridge is covered with desert pavement, a fragile, but stable, rocky surface. In the absence of biological or geological events, the pavement will remain largely unchanged for millennia. Yet even slight disturbances, such as the growth of a creosote bush, the seasonal migration of bighorn sheep, or a solitary hunter clearing a place to sleep, will mar the pavement, with the resulting displacement of rocks visible for the ages.

The desert pavement, then, acts as a canvas for recording human activity (Hayden 1965). Unlike midden sites, which require years of cumulative human activities to form, sites on desert pavement reflect transitory, often singular,

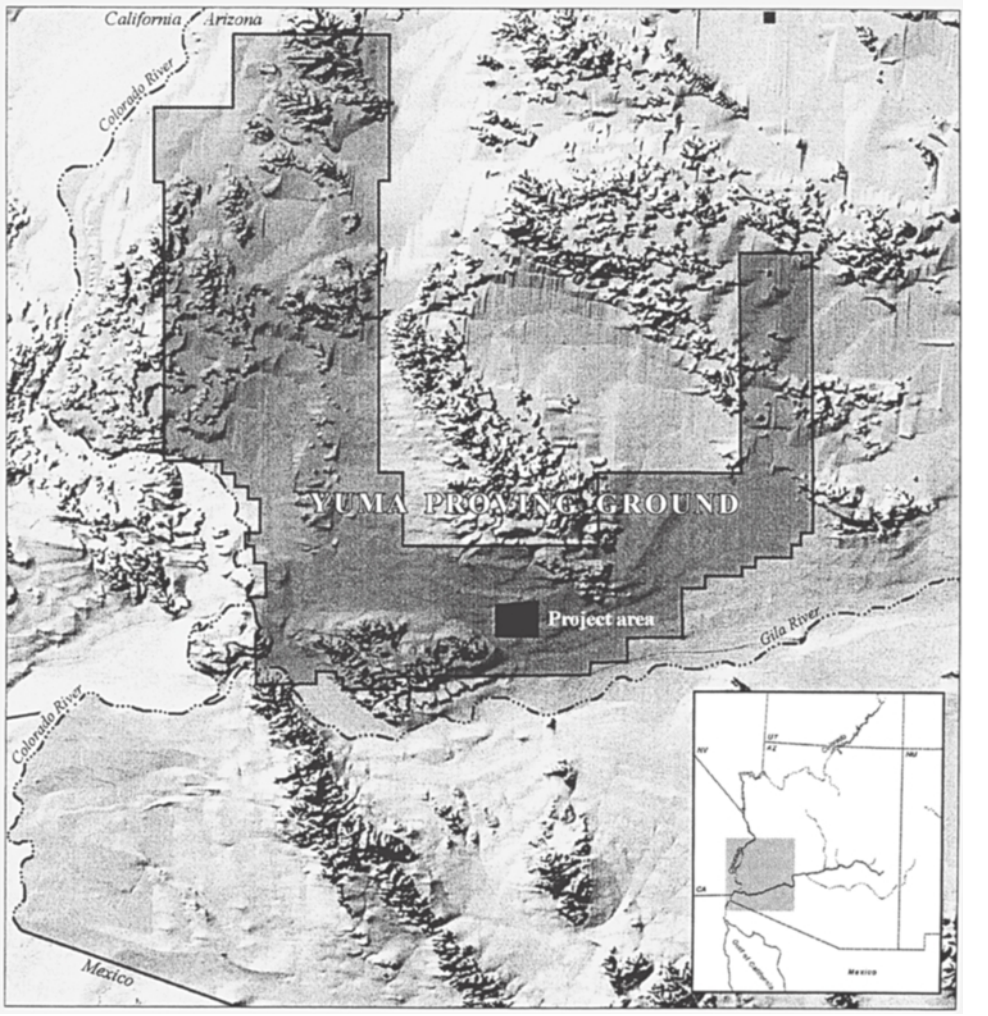

Fig. 11.1. The Yuma Proving Ground, Arizona, showing the project area.

events, such as an overnight camp, an hour-long flaking event, or simply the placement of an offering in a trail shrine. In the course of our survey, more than 650 prehistoric cultural resources were identified (figure 11.2). These were divided into six categories: artifact scatters, cleared areas, rock rings, rock cairns, trails, and sites with multiple feature types.

There is very little to the archaeology of the desert pavement. None of the resources exhibit subsurface deposits. Artifact scatters ranged in size from one artifact to at most a few hundred. No site contained more than twenty features.

Research questions in the area tend to focus first on establishing a culture history and second on such topics as subsistence and settlement. Most archaeo-

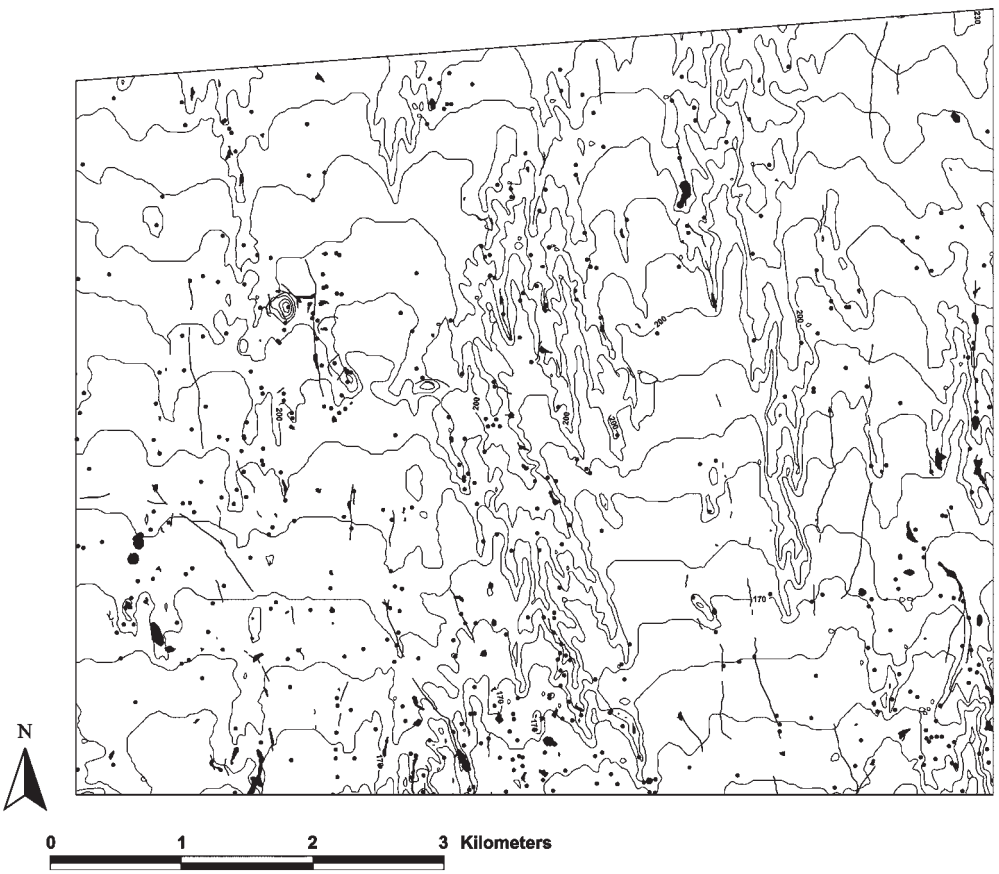

Fig. 11.2. Location of cultural resources identified during 4,000 hectare survey of a portion of the Yuma Proving Ground.

logical interest in the region has centered on larger sites along the Gila and Colorado rivers or at seasonal water sources in the mountains. For the most part, the interior of the western Sonoran Desert is viewed as a region to get through on the way to somewhere else. The sites are interpreted as inconsequential stopping places along the way. The sites may mark travel routes, but beyond their location they have no research value. Most archaeologists have considered them insignificant, and therefore not eligible for listing in the NRHP. The sites are not protected, and federal agencies, such as the U.S. Army, have been free to destroy them.

At the conclusion of our survey, we, too, faced the dilemma of documenting hundreds of cultural resources, but not being in a position to argue that further data recovery would produce new insights into prehistory. We could see no way

to use data recovered at the sites to inform on culture history or test models of past social processes. Still we were unsettled by the logical conclusion that the sites were not significant. What was needed was a different view of the archaeological record.

Over the last 12,000 years, the interior Sonoran Desert has been occupied by a succession of cultures. The use of the desert by each one is encoded in the desert pavement. By disentangling these features by time and cultural affiliation, we should be able to inform on how past peoples used the area. It is not simply activity sets, however, that must be uncovered. Human use is prescribed by a cultural model of the region, which defines how the mountains, rivers, pavements, and people interacted. Present day Yumans, for example, speak of a web of spirituality and power that connects major landforms. According to Lorey Cachora (2000: 105), an elder of the Quechan tribe, "although peaks are most important, valleys between peaks, and the desert pavements, are also important in that they are pathways for the web that must run through them from one peak to another."

Discerning a cultural landscape in the archaeological record requires a shift in perspective from artifacts and features to attributes that were used as landmarks by ancient people to define and partition their physical and spiritual universe. Trail markers, for instance, consist of very simple features, such as three rocks defining a triangular shape. Archaeologists often spend considerable effort describing the types of rocks and mapping their position. Rarely do these efforts led to insight into the prehistory of the region. In a few studies, however, archaeologists have tied the markers to features of the landscape. Gregory (1988: 68), for example, found flakes of a particular type of stone inside the triangle. He noted that these flakes were made of the same stone quarried at outcrops located farther down the trail. Gregory (1988: 71) pointed out that these markers were commonly placed at junctures where a trail split into two paths, almost like road signs on a modern thoroughfare.

Another common feature of the desert pavement is the power circle. These features consist of small areas (1–2 meters in diameter) where the desert pavement has been cleared away, leaving the sandy substrate exposed. Piles of quartz shatter are commonly found just outside the cleared areas (Johnson 1985: 37). Modern Yumans state that shattering quartz crystals releases spirits, and some informants interpret power circles as remnants of vision quests, whereby an individual goes into the desert to meditate and pray for spiritual guidance (see also Woods 1986). Johnson (1985) noted that power circles are often oriented toward particular peaks, suggesting a spiritual association. Plotting the location of power circles as well as other ideological features, such as trail shrines and geoglyphs, in relation to natural features might lead to the discovery of the key landmarks of the prehistoric cosmological landscape.

Linking together the sites related to resource procurement, such as quarries, flaking stations, trails, and trail markers, would yield an economic surface map,

or theme, of the region. A similar cosmological theme could be created by correlating ritual and ideological landmarks, such as power circles, geoglyphs, dance circles, and trail shrines, with natural features. Other themes, such as political boundaries, could be similarly constructed by plotting the distribution of cultural markers, such as particular rock art styles that have been associated with the prehistoric Patayan and ethnographic Yuman cultures (Doolittle 2000). Together, the various themes create a cultural landscape, a perception of the world.

From this theoretical stance, the markers of the various themes are the key attributes that must be documented to define a cultural landscape. These are the significant resources, even though they will not inform on the regional cultural history and they will not provide critical data to test hypotheses of social processes. Because it is the position of these landmarks vis-à-vis each other and physical features, recovering information on the actual markers themselves adds little to our understanding of the system. Instead of focusing archaeological investigation on the documentation of individual resources, a much more useful approach would be to first define the parameters of the landscape by following the trails to their logical ends. Additional work could then be used to better define landmarks, be they natural or cultural.

One problem posed by this approach for CRM is that each project must be considered individually. The U.S. Army is not concerned with the entire western Sonoran Desert, only the 4,000-hectare project area. It is this area that must be inventoried for cultural resources, and for significant resources, a satisfactory treatment plan must be created and implemented.

Although large by many standards, the project area is too small to discern patterns of desert dwellers that range over much larger regions. The trail system, for example, traverses the entire north–south dimension of the project area, leaving us guessing where these features start and stop (see figure 11.2). Without knowing the full extent of the cultural landscape, can we use this theoretical approach to understand the past, and ultimately to assign significance to individual resources? The results of the Yuma Proving Ground survey suggest that the answer is *yes*.

Two landscape themes can be identified in the project area: economic and cosmological. Large numbers of flaking stations suggest that the procurement of lithic material was an important activity. The creation of stone tools may indicate that local plant resources were targeted as people traveled across the pavement. Alternatively, people may have made stone tools and preforms to use elsewhere. To determine how ancient people approached the use of stone resources, we must discern how they perceived the area: as a barren zone to get through, or was it a destination?

Often found near flaking stations were two other feature types: large cleared areas (three meters or more in diameter) and rock rings. Both feature types are commonly interpreted by archaeologists as temporary shelters. Rock rings in the project area tended to be found as isolated resources or in pairs at some distance

from trails. Cleared areas, in contrast, were commonly found in groups of five or more features immediately adjacent to well-traveled paths. There are several possible explanations for the differing spatial patterns. The two feature types could represent different approaches to camping in the desert by distinct cultures. These cultures could be separated in time, or utilizing the same territory as contemporaries. Alternatively, the distinction between the methods of camping could represent different group structures and/or lengths of stay, such as hunting groups of single men creating cleared areas along the trail for overnight stays, in contrast to domestic groups stopping for several days to exploit local plants and moving off the trail for privacy and protection.

Features related to the economic landscape, such as rock rings, cleared areas, trails, and flaking stations, are complexly related. Before we can discern an economic theme, we must disentangle the various elements by time and culture. To do so, we must define other regional economic landmarks, such as the riverine villages along the Gila and Colorado rivers and the seasonal camps at natural water tanks in the mountains as well as natural resources, including other lithic resources. Comparing the attributes of the various elements should provide insight into how ancient peoples constructed their economic landscape, and in so doing provide us with answers to whether the lithic resources of the project area were highly prized, if the plants of the project area were targeted, what cultures used the region, and how they organized themselves to exploit the natural resources.

A second theme pertinent to the project area involves cosmology. In two locations, broken ceramic bowls were found. This find is curious, for most ceramic vessels found on the desert pavement are jars, which have an integral part in the processing desert succulents and transporting water (Underhill 1939). Bowls, in contrast, are generally used in the consumption of prepared foods. Cooking, however, is an unlikely activity at these sites. The bowls in the project area were found on exposed terraces largely devoid of plant life. Although the broken vessels were located near major trails, no rock rings or cleared areas were found nearby, and there is no indication that people stopped overnight at these locales.

An alternative explanation was suggested by a Quechan informant, who stated that members of his tribe would take bowls into the desert and break them as a means of communicating with the spirit world (Vanderpot and Altschul 1999: 161). The two sites are located on exposed, elevated landforms from which one can see the surrounding mountain peaks. The topographic situation of the sites certainly fits with settings of other ritual sites known for the region, such as power circles and geoglyphs.

Although the use of these sites in performing rituals is plausible, we are a long way from constructing a cosmological landscape. We do not know, for example, where these sites fit in this theme. Are these the only ritual stops on the trails or are there others? If more exist, are they found in similar settings? Do they offer views of the same natural features?

A necessary first step in constructing a cosmological landscape would be to follow the trails to their end points. We could then determine whether other, similar sites are found along the trail, and in what setting. We could also ascertain the mountain peak that was the destination of the travelers, and determine if ritual pot-break sites were situated either individually or as a group to line up with this natural feature. Perhaps most important from a compliance perspective, we could specify additional attributes to record at these sites as part of a mitigative treatment. Before we pick up the potsherds, we want to ensure that in so doing we do not preclude making critical observations.

The U.S. Army requires use of the project area now, not at some time in the future when we have a better understanding of the cultural landscape. Decisions, such as which, if any, of the 650 cultural resources are significant and which ones should be subject to data recovery, have to be made. In providing recommendations, we had to conform to the prevailing compliance procedures. Although we could have nominated the entire western Sonoran Desert as a rural landscape, such an approach would not have prevailed. Landscapes that are eligible for listing in the NRHP must have distinct boundaries, and the physical setting of the various elements must be integrally related to the historic fabric (McClelland et al. 1989; Collins 2000). By its nature, our project area could not be considered a complete landscape; based on our work, we were not even in a position to suggest spatial parameters (see also Gray 1999). More fundamentally, our use of landscape theory was not oriented to define a historic property, but to study the past. We used landscapes as an analytical tool to explain past human behavior. As with all scientific endeavors, our work is cumulative. Our understanding of desert pavement archaeology will increase in time in relation to our ability to construct and refine theoretical landscapes, which may not have any direct relationship with rural landscapes as defined by the National Register.

We were, thus, limited to three choices for evaluating cultural resources discovered at the Yuma Proving Ground. We could assess individual resources, define a historic district and evaluate each resource in terms of its ability to contribute to the scientific questions on which the district was formed, or consider the significance of site types and then select representatives of significant classes for treatment. We selected the last option, termed a multiple property evaluation (NPS 1991). In a somewhat forced argument, we abstracted key findings of the landscape approach and presented them as a series of settlement models of the western Sonoran Desert. We then linked each site type, such as cleared areas, rock rings, trial shrines, and artifact scatters, to the models, and developed a number of research questions that data from each site class could potentially address. In this way, we argued that each site class was significant.

The next step was deciding on a treatment plan. We recommended that instead of performing data recovery at a sample of each site type, archaeological reserves be created on each of the trail systems that preserved a set of each feature type as well as their relationship to each other and to natural features. As more

surveys are conducted in the region, additional landmarks will be found and the relationship between cultural and natural features more fully understood. Key attributes of cultural features will be identified that will inform on landscape themes. By preserving large contiguous blocks of land, we will retain the ability to make these observations in the future. In all, about 25 percent of the cultural resources were protected. The Arizona SHPO agreed with these recommendations, but initially concluded that treatment must also include data recovery consisting of systematic collection and analysis of artifacts from a sample of sites not located in the preserves.

I am sympathetic with the position that we should do something before a significant site is destroyed, but I am less sanguine about the scientific import of data recovery at desert pavement sites. In the past, reports of data recovery at these sites have been uniformly descriptive, little more than butterfly collections that are looked at but not helpful in interpreting the past. Much of the problem lies in casting these archaeological programs as means of addressing culture historical questions or models of desert subsistence (see Doelle 1980). These questions require absolute or relative dates and subsistence data, neither of which is likely from desert pavement sites. These sites, however, do contain information in their relationship to each other, and in their relationship to the natural features, about how people perceived, interacted with, and modified their environment. Investigating these relationships requires us to look beyond the confines of individual project areas and to record attributes of both cultural and natural phenomena. Significance is not attributed to individual resources or to their physical attributes, but to cultural concepts that are embedded in their place in the landscape. Extracting those concepts requires us to first take a global perspective in defining the parameters of the landscape, then establishing landmarks of various themes, and finally comparing and contrasting salient characteristics of these landmarks. Data recovery consists not so much of picking up artifacts as of recording thematically related attributes of cultural and natural landmarks. Instead of focusing on sites and artifacts, we need to establish a data recovery plan for the region that includes following trail systems to their logical ends, recordings cultural and natural features along the way, establishing the thematic uses of the desert, and inferring the prehistoric cultural landscape. Once we establish an overarching research program, then effort levels for particular projects can be established based on the size and impact of the undertaking, with some of the effort being placed on surveying the project area and the balance being used to examine parts of the region that might never be impacted. Such an approach, however, is incompatible with a process that focuses solely on areas to be impacted and narrowly defines treatment in terms of avoidance or data recovery.

After considerable negotiation, the impasse was broken. The Arizona SHPO and the Yuma Proving Ground agreed to mitigate the impact of military activities in the project area through a combination of preservation and data recovery. The agencies further agreed that the data recovery program should focus not on sites

but on an archaeological landscape to be defined through a study of the trail systems. As stated in the Memorandum of Agreement (2002: 2), "With current archaeological methods, the 'potential to yield important information about prehistory' exhibited by the archaeological record of this area is at the scale of the landscape, not at the scale of sites or features." Accordingly, the treatment plan "will focus on determining start and end points of trail systems present within the . . . [project area] and on identifying possible connections to physical landmarks and resource areas." (Memorandum of Agreement 2002: 4). Thus, the objective of studying past behavior as a regional process was achieved, although it was only after we transformed our theoretical notion of landscapes into concepts consonant with the NHPA.

Discussion

Often in preparing site evaluations or treatment plans, I have the feeling of trying to push a square peg into a round hole. Whatever my theoretical conception of a resource, I must frame the argument in a specific way, using particular terms. Culture history and problem-oriented hypothesis testing remain the dominant frameworks for American CRM. To use a different theoretical orientation requires translating its elements into familiar terms and posing them as research questions that meet a standard bureaucratic formula.

The Yuma Proving Ground example presented above is an all-too-frequent experience. The archaeological features found on the desert pavements of the western deserts of Arizona and southern California are related in a linear fashion, with features along a trail created by the same people in a temporal sequence. Much of the scientific importance of each feature lies not in its physical characteristics, but in its spatial relationship with other cultural and natural features. Landscape theory provides a powerful theoretical tool to discern and interpret meaningful cultural patterns. The theory's constituent elements, landmarks and spaces, are not related in a one-to-one manner with individual cultural manifestations (Whittlesey 1998a: 24; Zedeño 1997; Zedeño et al. 1997). Even though we may argue that cultural space and landmarks may yield important data on prehistory, it is difficult to transcribe that importance into historic contexts, research questions, hypotheses which can be reduced to simple statements about whether a particular resource is or is not significant.

Although the bureaucratic structure surrounding the attribution of significance may be burdensome, one might argue that it has a largely benign effect on the end result. After all, the Yuma Proving Ground resources were considered significant, a considerable number were saved, and a data recovery program focused on trail systems was initiated. This assessment disregards the fact that in many undertakings the same types of resources have been determined to be nonsignificant. More importantly, the process was unnecessarily complicated and would be difficult to replicate. The survey initially recorded cultural resources as

archaeological sites and isolated finds following guidelines provided by regulatory agencies. These phenomena were then transformed into the theoretical constructs required by landscape theory (landmarks and spaces) only to be turned back again into sites and isolated finds to determine significance and to develop a treatment plan. One might argue that the flexibility offered by NHPA compliance is a sign of a healthy process, and should be encouraged. I, in contrast, view the required intellectual gymnastics and tortured arguments as telltale signs of a jury-rigged, bureaucratic structure that is showing its age.

Conclusion

Significance is a key concept in American CRM. Impacts caused to archaeological sites by federal projects are only taken into consideration if the resource is significant. As codified in regulations, one of the key measures of the significance of an archaeological site is its potential to yield important information on the past. Importance is attributed to sites that can address issues of culture history or social processes. I have argued that the focus on culture historical research and problem-oriented hypothesis testing is not related to a logical link between the two schools of research, but to the intellectual context that engulfed American archaeology at the time the NHPA was passed. Over the last thirty-five years, this relationship has been reified in a process with familiar and comfortable roles through which compliance with the law is achieved.

Scientific significance is attributed to an entity if it has measurable attributes that relate to theoretical propositions under study. As theory changes, so, too, does the subject of inquiry. The science of archaeology is no different. One of the major hurdles in conducting archaeological research within a CRM setting is using a definition of significance that is fixed in a scientific field that is changing. In this paper, I have shown how the use of a particular theory may change the way we define important archaeological manifestations. The theory in question, landscape theory, is not important; it too may pass from the intellectual stage. What is important is that we find ways to recognize the changing scientific nature of significance of the archaeological record in a compliance process that begs for routine. Meeting that challenge will allow American archaeologists conducting CRM to play a vital role in the changing discourse of the field as opposed to scientists forever condemned to a Dante-like hell, where they continually look at their subject from one perspective, making the same discoveries over and over again.

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Archaeological deposits and value

Jane Grenville and Ian Ritchie

Introduction

Heritage management is often reduced to day-to-day regulatory decisions regarding the fate of archaeological deposits. These decisions are usually made in response to development and resource extraction plans made by corporations or government agencies. The decision makers are generally government officials or local politicians, and their conclusions are usually made with the advice of professional archaeologists. In arguing for the relevance of surviving material remains of the past, archaeologists are often characterized as opposing the social, economic, and political benefits of development. In this paper, we address the issue of how archaeological and heritage matters may be seen more positively and as inherently valuable.

It can be difficult to argue this case with the initiators of economic projects, who often see archaeology as having little "real-world" (by which they generally mean economic) value. If it were universally the case that economic factors are always paramount, then archaeologists and their supporters among the lay public would appear to be doomed to argue repeatedly for the financial value of the archaeological resource as a visitor attraction and that of the historic built environment as an enhancement to quality of life, and thus a positive attraction to a workforce seeking congenial surroundings in which to live. In York, we are familiar with both of these aspects of the economic argument. The Coppergate rescue excavation of the late 1970s and early 1980s, for instance, was transformed into one of northern England's foremost tourist attractions with the opening of the Jorvik Viking Center in 1984, and in many ways acts within the tourist economy of York in a similar way to an "anchor" department store in a large retail park, while both public and private bodies trade shamelessly on the historic character of the city to attract less-transient populations (the Archaeology Department of the university is housed in one of the most beautiful medieval buildings in England, and we make much of that fact in our publicity materials for prospective

students). But the very fact that these enterprises are successful suggests that today's sophisticated consumer sees something "worth buying" in the past and its material manifestation in the present. And if they are prepared to buy it, they are anxious to consume it in other, less financially defined ways: they want to understand it, and its study and conservation are part of that process. Archaeologists should take heart and argue more boldly for the inherent *interest* of the archaeological resource.

This, at heart, is the argument presented by Martin Carver, Professor of Archaeology at the University of York, United Kingdom, who proposed in 1996 a way of thinking about archaeology that would provide archaeologists with strong, socially relevant arguments for the value of research in a broader economic and social arena. In this paper, by two of his colleagues, we review decisions taken in two very different situations, one in York and the other in a fairly remote and underpopulated area of Wyoming, and assess how far the Carver model was successful. One might expect that in York, where the past forms such a key component of the present, an opportunity for a major new archaeological discovery would be seized with both hands. On the other hand, in the mineral extraction industry of Wyoming, the potential for finding out more about past inhabitants of the area would scarcely raise a blip on the developers' Richter scale of significant areas for investment. The outcomes were in fact the reverse. In this paper, we revisit current methods employed for attributing value to archaeological deposits and materials and assess the implications of the two cases. We apologize in advance for any misrepresentation of Carver's views. The conclusions reached are our own.

Background

Martin Carver has developed his views on evaluation over many years (Carver 1987, 1990, 1993). His paper "On archaeological value" (1996) arose partially out of discussions with postgraduate students taking the master's degree in Archaeological Heritage Management at York, a program then directed by Jane Grenville, and attended by Ian Ritchie as mid-career development. Grenville's approach to the topic arises partly out of a skepticism born of a three-year stint with the Council for British Archaeology in the late-1980s arguing the case for archaeology in a plethora of public inquiries on planning issues. A British public inquiry is akin to a court case. Each witness presents a formal case, is cross-examined by the opposition, often employing high-performance lawyers for the purpose, and is reexamined by his or her own lawyer or lay advocate. An independent inspector adjudicates and his/her decision is forwarded to the appropriate government minister for approval or rejection. Within the framework of material considerations set by successive governments in a series of Planning Policy Guidance notes (PPGs), the provisions to protect the archaeological resource of PPG16 (*Archaeology and Planning*) and PPG15 (*Planning and the*

Historic Environment) are helpful, but they are explicitly set against economic imperatives, so strength of argument is paramount in winning a case. Unless it can prove a high economic potential in its own right, as in the case of the Jorvik Center, archaeology has to rely on other more subtle appeals to amenity value and the general good. Later, in teaching the Archaeological Heritage Management course, Grenville had the opportunity to reflect more generally on these issues (Grenville 1993, 1994, forthcoming); more recent thinking is expressed within this chapter. Ritchie bases his views on twelve years of work as a federal agency archaeologist, advising and acting as advocate for archaeology within the American legislative system, and on the year of reflection spent at York. We are grateful to Martin Carver for his comments and to David Brinklow of the York Archaeological Trust, who discussed the first case in some depth with Grenville, but stress that the opinions expressed here are ours and not necessarily shared by them.

This chapter is in three parts. First, we summarize Carver's paper and highlight major points we wish to return to. Then, we present two case studies, one where the model entirely failed to deliver and another where it appears to have been successfully applied. We will examine the reasons for these differing outcomes with the benefit of several years' hindsight. We end by trying to decide whether the model is robust enough to survive in the real world, or whether it should be quietly done away with. The chapter was written with the Atlantic between us and therefore communication was entirely via e-mail. The division of responsibility in authorship is that the original drafting of the first section was Ritchie's, with comments from Grenville, and the reverse was followed for the last section. Each of us wrote up our own case study.

"On valuing archaeology"

And so to the main points of Carver's 1996 argument. Archaeology in Britain has been torn from the grasp of central government and placed in the arms of a market that acknowledges no value in the subject itself (unless the results are so spectacular as to underwrite an income-generating tourist attraction). This market sees archaeology and its evaluation as a hurdle in the path of economic development. Accepting as a fait accompli the fact that archaeology is no longer protected by the strong arm of the state, Carver has argued persuasively for the need to develop an arsenal of intellectual weaponry to defend the archaeological resource against the marauding appetites of land-hungry developers. He states that "the fate of archaeological sites is no longer the exclusive preserve of an inspector, but has come to depend on the outcome of a debate between several groups of players: developers, planners, community taxpayers, and academics. This debate is informed by the predictive value that each party can put on a piece of land. . . . The purpose of this paper is to propose a definition of archaeological value which can serve the debate on behalf of archaeologists" (Carver 1996: 45).

This definition eschews the traditional view of archaeological sites as "monuments," as enshrined in British legislation, and instead takes the line that it is research value that provides the key to the debate. Carver notes that previous commentators (in particular see Lipe 1984; Darvill 1993) have identified some of the values attaching to archaeology, but have not defined how they compete with one another, let alone with market and community values. Market values are those of capital and production. Community values (the common good, the rights of minorities, political value) are measured in cost and votes. Archaeological value is defined as a global human value (along with environmental value), whose measure is not to be had in money or votes, but perhaps in a "feel-good" factor or sense of ontological security. Carver's argument is that some of the values assigned by other commentators (monetary, touristic, and associative) ultimately derive from that informed interest in the past, which we might define as basic archaeological value. This human interest in the past, and its spin-offs, are what he perceives as lying at the core of archaeological activity.

In redefining the battlefield, Carver's proposed strategy include the following points of attack:

- Archaeology has to be shown to have a payoff for society at large (however that may be defined), and this seems to be in terms of sufficient moral rewards and human benefits to allow the community to suspend, temporarily, its normal desire to maximize profit and allow archaeologists access to the land instead;
- It must have a large and supportive clientele to sustain this noncommercial value;
- It must be able to support its attribution of value convincingly outside and inside the profession;
- It must be anticipatory rather than reactive; and
- It must insist on the global, not national, character, of its definition.

Carver goes on to review arguments between empiricists and idealists about whether data have independent objective existence, or whether they are simply those observations which we choose to accept as relevant at the moment of observation. He plumps firmly for the latter: "the heritage is essentially man-made and membership of this illustrious and privileged archive depends entirely on contemporary knowledge and political will" (Carver 1996: 50). Furthermore, and at the heart of his argument, is the notion that "monumentality" defines what is known and that "research," in contrast, favors the unknown. This is the nugget, the punch line. Carver notes "here then is a paradox: the point of archaeology is to know more; but the resource on which it depends is managed so as to favor what is already known" (1996: 52).

Following on from this, one of Carver's central propositions is that "archaeological value is ascertained by matching the deposit model to the research agenda" (1996: 53–54), and that having established it, sites of high value should

be excavated and the rest conserved. Here the ideas run into direct conflict with prevailing practice: given that value has, up to now, been identified in the United Kingdom by using notions of monumentality, it is hardly surprising that decisions about excavation adhere to the reverse principle. PPG 16, *Archaeology and Planning,* recommends, in direct contradistinction to Carver's principle, that sites of national importance should be preserved and those of lesser importance excavated or released for destruction. It is critically important to remember here that Carver's approach demands the excavation of sites for which there is a clear research agenda (that is, those whose importance can be demonstrated in terms of their potential to yield *new and relevant knowledge*). PPG16 demands their preservation in situ. It is worth noting that the options, in this idealist view, are either to excavate or conserve; nowhere does either camp admit that a frequent outcome is the sacrifice of archaeological deposits unrecorded. This is an area we shall return to at the close of the paper.

So Carver proposes a brave new world in which archaeological decision making is on the basis of research interest, and exciting sites are excavated, not left to those shadowy "archaeologists of the future," who are going to have much better facilities and techniques than we have. New stories will be woven, new research directions suggested, and the whole profession will march forward with confidence and intellectual vigor. This is very different to the current realities of a PPG-led archaeology in the United Kingdom and a deregulated system in the United States, but could it happen? In this paper, we look at two case studies, one where the idea foundered and the other where it appears to have had some success.

Case study 1: A possible Roman amphitheater and some medieval townhouses

York was founded as a Roman legionary fortress in A.D. 71 on a virgin site above a crossing of the navigable River Ouse. It thrived mightily and spawned a major civilian settlement or *colonia* on the southwest bank of the river in the second century. Roman masonry survives to some height in the southwest wall of the typically playing-card-shaped fortress, and much material from Roman times has been excavated since the early sondages of the nineteenth century (see fascicules in the *Archaeology of York* series published for York Archaeological Trust by the Council for British Archaeology for more detail) but the location of the legionary amphitheater, which would have been comparable to that at Chester, has never been ascertained. Little is known of the settlement in the fifth and sixth centuries, but by the seventh it was certainly an ecclesiastical center; for here, according to Bede, King Edwin of Northumbria was baptized. Excavations have revealed the continuing prosperity of the city from the eighth century onward, and York's post-Conquest importance as the second city of the kingdom, the seat of the archbishop of the northern province of the English church, and an economic power based on the textile industry and general trading, is observable in the riches of its medieval architecture. As the textile industry migrated in the early

modern period to the West Riding, York lost its economic preeminence, and its status sank to that of a typical English county town, although the presence of the great cathedral always marked it out as one of particular social gentility.

Left behind by its near neighbor, Leeds, during the Industrial Revolution, York made a modest industrial recovery in the later nineteenth century as a center for the manufacture of railway rolling stock and chocolate, but it could never be described as one of the great industrial centers of the north. Its poverty was documented in minute detail by Seebohm Rowntree (a scion of one of the great York chocolate dynasties) in his 1901 pioneering classic of social studies *Poverty: A Study of Town Life*. York in the 1950s and 1960s had a decidedly down-at-heel air, as Grenville can remember from childhood visits, and as Kate Atkinson brilliantly documents in her novel *Behind the Scenes at the Museum* (1995). Atkinson's title is significant; by the 1960s, York was beginning actively to trade on the fact that its glorious past and swift decline had left a legacy of historic buildings that were never cleared in subsequent periods of prosperity. Additionally, its riverine location preserved an archaeological resource of remarkable intactness, with organic materials surviving exceptionally well in anaerobic conditions; the Jorvik Center cleverly interprets and displays information from a particularly rich ninth- and tenth-century site.

The redefinition of York as a prime tourist destination is now complete. Once again, as in the late medieval period, it is second only to London, in one respect at least. Direct revenues to historic buildings and sites, but perhaps more critically the secondary spending of tourists on accommodation, food, and souvenirs now form a major aspect of the city's economy. Its historicity is used as a magnet for potential employers and their workforces, and white collar businesses such as insurance, call centers, and indeed the university itself are now major employers, with only chocolate manufacture surviving as large-scale industry (York is the home of the international bestseller, the Kit Kat; although curiously enough, Yorkies, made by the same firm, are manufactured in Norwich!).

So in a city that depends on the beauty and interest of its historic features for a significant fraction of its annual income, how does Carver's model fare? In the center of town, there is a little side street called St. Andrewgate. Its line lies directly outside the wall of the Roman fortress. To the southeast, a site lay vacant from 1984 until the late 1990s. Recently, it has been built on with a series of bijou townhouses of the type we have become wearisomely familiar with since York's economic renaissance began in the 1970s. But these have a singular feature; their ground floors are all two to three feet above the road, and there are steps up to the front doors. This is not a flood precaution, for we are well above the highest of flood levels here. Rather, it is a precaution against the expense of an archaeological excavation, for this has been suggested as a likely site for the undiscovered Roman amphitheater (Ottaway 1993). Archaeological evaluation by the York Archaeological Trust had shown well-preserved medieval structures along the

street frontage and boreholes suggested a large, saucer-shaped limestone structure, at several meters depth, to the southeast of the site. Applying Carver's model, the clever and intellectually bold response would have been to undertake a research project to excavate selected parts of the site over a two-year period, with a funding package from various public and private sources, including the developer. The research benefits for the Roman period were clear. Identification of the site of the amphitheater would be a coup in itself, but its careful excavation to understand its use and the process of decay could have revealed much that we do not understand about Roman York and the period after the legions left. Furthermore, the potential for careful excavation of medieval house plots would have provided an opportunity to marry some of the evidence gleaned from the standing buildings investigated by the Royal Commission on Historical Monuments (1981) and latterly by Grenville and her students (Grenville 2000). Not surprisingly, a consortium of the York Archaeological Trust and the York University Archaeology Department put together a proposal for a carefully targeted research strategy to sample parts of the site. Public access to the excavation and a clear information strategy were major components of the scheme: this was to be archaeology in the public interest (in both the intellectual and commercial sense of that word).

Here was the site par excellence on which to test our commitment to archaeology. There is nothing to grab the public's archaeological imagination like an active and well-interpreted excavation, as the reaction to the Coppergate dig twenty years previously had shown, when thousands of visitors queued for a chance to view the work in progress. Negotiations began. The developers were reasonably agreeable to the prospect of a major research excavation. They were prepared to provide some funding (mainly in kind, in the form of mechanical diggers and the provision of a viewing platform). Other funding sources were approached. The city archaeologist, an officer of local government charged with negotiating archaeological mitigation under PPG16 and advising the elected members of the city planning committee, was enthusiastic, and the politicians themselves were amenable to the idea. All looked set fair. So what went wrong? It would be inappropriate to enter into the details of the negotiations between the developers and the council in a paper such as this, but broadly speaking, in a disagreement over the fundamental planning issue of density of housing, the developer threatened to withdraw support from the archaeological project. To the city councilors, this was a very minor matter and they immediately acceded. The archaeology was simply not important enough to either side to be worth fighting over and was tossed out of contention without a second thought. The debate over density raged on unabated. No amount of lobbying on the part of the archaeologists could make any difference to this: without the economic and political support of either developer or council, this was a lost cause. To return to Carver's military analogy, the archaeology simply became "collateral damage,"

and nobody except the archaeological consortium cared much. Instead of the great plans for a research excavation, a narrow trench was dug along the route of a new service road, with predictably incoherent results, and the ground was raised up by three feet on the advice of the developers' independent archaeological consultant, in order to avoid damaging the deposits. This was a perfectly reasonable solution within the letter of PPG16, which enjoins the preservation of nationally important sites, but one which sacrificed the research value for at least another century and probably more.

If we apply Carver's three sets of value and test his model, it seems that market forces were strong, community value was interpreted only in terms of the planning issues of site density, and archaeological value, however huge it seemed to us as professionals, was quite simply too puny to have any serious impact at all. How could it have been different? We will return to this issue in the final section, having considered a case with a more favorable outcome.

Case study 2: Stone circles and coal mining

We now turn from York to the wide, open spaces of the American West, to see how archaeological deposits there are faring. Wyoming is big, has a relatively small population, and is heavily reliant on mineral extraction for its economic survival. Much of the land is held by the central (federal) government. The Powder River Coal Company (PRC) holds leases on federal coal under federal land managed as the Thunder Basin National Grassland, by the United States Department of Agriculture (USDA) Forest Service. Coal mining is conducted on both land belonging to the state of Wyoming and privately owned lands in Campbell County. In order to operate in the most cost-effective way, PRC has been focusing on recovering low-overburden coal along Porcupine Creek, where numerous prehistoric sites on the first and second river terraces will be affected. The large number, high density, and specific composition of the sites highlight the importance of the prehistoric and historic native peoples as well as homesteaders and ranchers of the semiarid Powder River basin. The mediation of the interests of coal mining versus those of the archaeological deposits in large part must follow the processes outlined in two key pieces of federal legislation: the National Historic Preservation Act (NHPA) and the Archaeological Resources Protection Act (ARPA).

Under various regulatory authorities of the Office of Surface Mining (OSM), the USDA Forest Service, and the Department of Environmental Quality of the State of Wyoming, PRC hired an archaeological contracting firm to complete any outstanding survey and to conduct evaluations of the sites in affected areas along Porcupine Creek. The evaluations included testing to determine the extent, depth, and age of deposits with a goal of determining their eligibility for the National Register of Historic Places. Sixteen sites were evaluated and of those, six were added to the register. These included lithic scatters, stone circles, hearth

features, and buried cultural horizons, as well as two historic-period sites. The ten ineligible sites (those with no research potential owing to the state of their deposits) will no longer be managed. Their data are assumed to be fully recovered, and coal extraction will destroy their physical remains.

Data recovery plans have been developed for the eligible sites, and three of these have been implemented. There are two key areas of investigation: first, the known stratified deposits on the banks of Porcupine Creek, and second, the broad area exposure created with road graders to uncover activity areas and features associated with the stone circles. The aim is to decipher the spatial organization of Plains people over time (and across different contemporaneous cultures). The research questions being addressed include spatial analysis of hearths and family and community activity at loci of late prehistoric stone circle (teepee ring) sites. This spatial analysis is a major step forward in research in the Powder River basin, after at least ten years on a research/knowledge plateau, which had established chronologies, seasonality, and resourcing strategies fairly well but had not tackled social organization.

So here is a case where the local curators have set up a research program and persuaded the developers to implement it. Carver's model has delivered precisely the outcome that its creator intended. Superficially, it seems strange that in York, an archaeological "honey-pot" that trades on its illustrious past and the fascination of its rediscovery (and has a density of archaeologists per thousand of population higher than most places!), the model failed, while in the remote American West, where one might expect the power of a strong economic lobby to triumph, it was possible to align the public interest, the archaeological significance, and the developers' goodwill to produce a positive result. How can we analyze these two outcomes to evaluate the efficacy of Carver's model?

Conclusion and implications of the Carverian model

It is often said that it is easier to explain what went wrong when a project fails than to analyze the elements of a successful outcome. In this case, however, we will be taking the opposite view; it is reasonably easy to account for the success of the Wyoming project, and once that is identified, the shortcomings of the York scheme may be better understood. From this analysis, we hope to draw some caveats to attach to Carver's model and a prediction of situations in which it is likely or unlikely to produce results. In Wyoming, two external factors underpinned the negotiations: first, public opinion, and second, the law.

Public opinion

Wyoming is a mainly rural state, and mineral extraction is one of the main engines of its economy. Several sites have recently been "accidentally" destroyed or damaged by expansion at the mines. The state newspaper picked up on the fact

that the fines imposed had been lower than the cost of the archaeological evaluation and investigation would have been and made the obvious observation that it is cheaper to destroy archaeology than to preserve/investigate it. So what incentive is there to mining companies to look after the past? This provoked outrage among the good citizens of Wyoming, and so great was the reaction that in order to recover their public relations losses, the PRC and other companies have initiated a more responsible program of archaeological investigation.

Is it then the case that in Wyoming, the argument turned on public opinion? The community embraced the archaeological argument and made sufficient impact in a newspaper campaign to persuade the developers that cooperation with the archaeologists was the easier option. In York, there simply was no public opinion. The negotiations over the St. Andrewgate development never hit the local press. The fact that it did not is perhaps surprising. The local newspaper, the York Evening Press, is widely read and well respected. It frequently takes up populist causes. Local television and radio stations are also effective and reach a wide audience. Archaeology has certainly played a prominent role in the media in the past: in 1989 a controversy over the excavation in advance of the development of a site known as the Queen's Hotel hit the headlines. Archaeologists had worked through very productive, waterlogged medieval deposits to reach the upper levels of a major Roman building when the time allowed for research by the regulations then in force was up. Massive public pressure ensued, with the story leading the front page and reaching the regional and finally the national television news bulletins. Although the site was never fully investigated, some reprieve was won, and the case was instrumental in the major changes to the administration of rescue archaeology ushered in with the new PPG16 advice in 1990.

Will most community values and archaeological values, as separately defined by Carver, in fact, be congruent in practical terms if the model is to succeed? Public opinion matters to politicians. Local politicians decide planning issues, and developers face an uphill struggle if they seek to implement deeply unpopular schemes. In many cases, the politicians and their paid officers will simply reject those projects that arouse public indignation. But there are cases where a significant sector of the local population is opposed to a scheme backed by the local politicians on the grounds of economic or political expediency. An interesting case of this was that of the excavations in advance of the construction of new city council offices in Dublin in the 1970s. Direct action seemed the only course available, so objectors to the project took to the streets in large numbers to protest the early cessation of research to enable construction to begin. Indeed, in York itself, a current controversy surrounds proposals for a major development at the foot of Clifford's Tower, the keep of the medieval royal castle and a major tourist attraction in the city. Here again, it has been direct public action in the form of a sustained press campaign, protest meetings, and even a street demon-

stration that has led to the holding of a public inquiry, whose outcome is not known at the time of writing, to decide the fate of the development.

There are, of course, dangers in following this line of argument to its logical conclusion. We should be aware of the risks involved in allowing broad public opinion to dictate what should and what should not be excavated. Archaeologists will have to become extremely canny and effective communicators, and, perhaps, formal training in public relations will become part of the undergraduate syllabus sooner or later. This is a lesson that should be well taken from the green lobby; yet archaeologists need to find very strong arguments to equal those of the environmentalists that the planet itself is in danger if their concerns are not heard and acted upon. Archaeologists can never claim that the world will end if we do not pay attention to archaeology, nor is it a safe argument to follow the oft-mooted suggestion that we must understand the past in order to avoid repeating mistakes. But the formulation of really strong justifications for archaeological research must be high on the agenda of heritage managers if Carver's model is to work.

This line of argument assumes that, logically, the case for archaeological research is always a just one, and that all archaeologists have to do is cleverly explain their case and all will fall into place. Yet this is manifestly not the case in situations where different agendas, for instance, the rights of indigenous populations or minority groups, are paramount. In the United States, the Native American Graves Protection and Repatriation Act (NAGPRA) demonstrates this argument very well. Here, the archaeological imperative has certainly not been seen as inalienably justified, and archaeologists as a broad interest group have lost out, whatever the positions of individuals within the various lobby groups (Thomas 2000). In York itself, the excavation of the putative Jewish medieval cemetery in 1983 was brought to a rapid halt by the legal action of some members of the modern Jewish community (Addyman 1994). Archaeologists have to understand that they form an interest group, and they must argue their case without the assumption that they have a divine right to win (Smith 1993). Carver's model seems to us to imply that assumption, and we would caution that, as human rights legislation begins to bite across the world, its legal implications will be tested most rigorously.

Finally, in considering the importance of community values in shaping the future of archaeological research, we would note that not every site is a Roman amphitheater and that unmediated public opinion alone would tend to favor such high-profile projects at the expense of less immediately engaging undertakings. However, the reverse is also the case: Ritchie strongly believes that a major reason for the success of the Wyoming case was the preparedness of the curatorial archaeologists to sacrifice some sites of lesser importance, given their state of preservation. Does such a willingness increase the confidence the developers need to feel, that they are not being led down a primrose path to major, but ultimately

unproductive, expenditure on research? The balance between public opinion, archaeological research, and economic imperative will require a mechanism for ensuring that compromises are reasonable.

Legal apparatus

Our aim here is not to consider in detail the legislation and planning guidance concerned in the two cases, but rather to point out, briefly, the centrality of regulatory systems in the outcomes we have described and to consider the position of the legal apparatus within Carver's model.

All the Wyoming work took place under federal laws on a privately financed project oriented to recovering coal leased from the federal government. If such a project were to be done on private land, recovering private resources without federal permits, then only state laws protecting archaeology would apply, and these are weaker. Protection and research would be much less likely. The federal system has proved relatively successful in using Carver's model for developing interesting research agendas and excavating sites of high research potential, but the case highlights the importance of legal muscle in achieving a result acceptable to the archaeologists. We argue that in a completely unregulated situation, archaeology is weak, relying entirely on the force of its arguments for the importance of the resource to win over public support and with it the acquiescence of the developer.

In the United Kingdom, as Carver notes in his original paper, the wording of the legislation privileges monumentality and the known over the unknown. Protection is offered to sites identified as being of national importance and scheduled as ancient monuments through the mechanism of Scheduled Monument Consent (SMC), which is administered on behalf of the government by English Heritage. Until 1990, unscheduled sites had little formal apparatus for their consideration, and archaeology tended to depend upon ad hoc decisions by local planners and by English Heritage, or on the goodwill of developers for the opportunity to investigate. Matters were formalized with the issue of Planning Policy Guidance Note 16: Archaeology and Planning, which advised local authorities that archaeological significance and potential should form a material consideration in the determination of planning consent. In other words, archaeology became a part of the planning system. As mentioned above, there are two matters to note here. First, the advice of PPG16 is strong, but does not carry the force of law. Second, in contradistinction to Carver's suggestion that the best, in terms of research questions and deposit survival, should be excavated and the rest sacrificed or preserved in situ, PPG16 recommends "where nationally important archaeological remains, whether scheduled or not, and their settings, are affected by proposed development there should be a presumption in favor of their physical preservation. Cases involving archaeological remains of lesser importance will not always be so clear cut" (PPG16, paragraph 8).

In the United Kingdom, then, research is in a relatively weak position, at least as far as rescue or planning-led archaeology is concerned. There are understandable reasons for the tenor of PPG16: the 1970s and 1980s had seen a spate of large-scale urban excavation, negotiated in advance of redevelopment, and although much was learned, publication and popularization lagged behind, and developers felt that the situation was unpredictable for them in terms of cost. PPG16 has offered a breathing space to archaeology to tackle its publications backlog and has made the excavation team a more familiar and understandable sight to the construction team and their bosses. But there are real anxieties, notwithstanding work being carried out to synthesize the disparate results of evaluation exercises, that research has fallen behind and that the true raison d'être of the discipline, to learn more about the past, is being lost in a welter of bureaucracy (Morris 1993, 1998; see Darvill and Russell 2002 for a more upbeat assessment).

Nevertheless, history, and not least the history of our two case studies, shows that without regulation, we are fighting a very tough battle. In order to get the balance of that regulation right, effective lobbying at the highest levels must be undertaken. We would argue that this requires taking research value and community value to the heart of government to produce a regulatory framework that will back up in general terms the particular arguments that are made, site by site, in the planning process. Carver's model assumes that his various value sets are equal in power in any given situation. They are not. The model will work only if research value wins over community sympathy to the extent that politicians are prepared to introduce legislative apparatus that will provide an additional weapon in the marketplace debate.

Conclusions

So what have we learned? First, that community values and archaeological value, as defined by Carver, must be congruent, both generally and in individual cases, in order for the model to work. That implies the need for a clear and acceptable research agenda that the public understands and signs up to. Popularization, while viewed with some anxiety within the profession, becomes an essential tool of the trade, as the complete failure to engage public attention in the St. Andrewgate case and the centrality of the newspaper coverage in the Wyoming instance, demonstrate.

Second, we must accept that legal provisions, notwithstanding their current basis in the rhetoric of monumentality rather than research, are critical to the success of the endeavor. If we wish successfully to challenge that rhetoric in the redrafting of laws and advice (and the PPGs are currently under review in the United Kingdom, so this is an apposite moment to comment), we must engage with the political process at the national as well as local level.

Finally, even if we accept the broad precepts of the Carver model, there remain

further challenges. What do we do when community values are clearly at odds with archaeological value? Do we justify, for example, the excavation of human remains to which vocal sectors of society raise loud objections, or do we back off and accept that our research agendas will be mediated by public opinion? One answer to this may be to become more engaged in the rough and tumble of open debate and to abandon the somewhat aloof "professional" stance that has served us in the past. Archaeologists, too, are members of the public and could benefit from arguing out their case from an experiential rather than an academic standpoint.

Another significant challenge is that, if we sacrifice parts of the landscape to development, how do we protect unknown sites or those "nonsites" which do not conform to our current theories and knowledge base, but which may, one day, be perceived as valuable. Do we even try? Archaeologists have to learn that taking risks and gambling on our present state of knowledge is an activity that is well understood by our partners/opponents in the business world. In learning to be bolder in this respect, we will be moving closer to the thought processes of the developers with whom we work, and we may well, therefore, find communications becoming easier. Ritchie found that the ability to "speak their language" in terms of making major decisions to write off sites stood the Wyoming archaeologists in good stead for developing a clear research-led strategy with developers. Conversely, we must dare to argue for excavation, even where preservation in situ is ostensibly a preferred option, if the research gains are so great as to outweigh the future value of the deposits. To illustrate this, when we read the original version of this paper in Bournemouth at the Theoretical Archaeology Group (TAG) conference of 1997 and Seattle at the Society for American Archaeology (SAA) conference in 1998, we were berated for our irresponsible attitudes toward archaeology in a climate of restraint and conservation. We counter this by asserting that we did not at any stage propose the *total* excavation of the St. Andrewgate site, but rather a carefully targeted sampling strategy based on exhaustive preexcavation evaluation, and by arguing that this is in fact the only *responsible* response to such an opportunity. If archaeology is to engage public interest, it must not let slip major opportunities for research and hence new stories to tell to an avid audience. Intellectual stagnation does not excite the general public. If the high profile cases are lost, what hope for the lesser?

Carver's model is full of assumptions about the inherent value of archaeology to the community. We argue that this link is not implicit, but needs actively and repeatedly to be demonstrated through tough negotiation over individual sites and general legal and planning principles. Carver's model seems to us to be designed for an ideal world, where archaeologists are local heroes and Joe Public is more motivated by interesting ideas than by the need to earn a living and the wish to earn a fortune. We hope that, through our case studies and comments, we have refashioned the model for a tougher future.

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13

Archaeological and Indigenous significance

A view from Australia

Ian Lilley and Michael Williams

In Australia, archaeological activity focusing on Indigenous sites is controlled by legislation that requires researchers and cultural heritage practitioners to get permits to excavate or collect. In some jurisdictions, this requirement also applies to site surveys and background studies that use recorded information about sites. The specifics of such legislation, and the policies that flow from it, vary among the six states and two mainland territories that make up the Commonwealth of Australia (see Flood 1989 for a dated but accessible and indicative survey). Generally, it is now the case that documentary evidence of consultation with relevant Indigenous groups and individuals, and quite commonly their formal written permission, must be provided to state authorities before a permit will be issued. Australian archaeologists must therefore convince Indigenous Australians of the worth of their work on a case-by-case basis, as well as at a more general level, if they are to continue to practice their craft. In this chapter, written collaboratively by a non-Indigenous "prehistoric" archaeologist and an Aboriginal scholar who is a senior member of the Gooreng Gooreng language group, we consider some of the issues generated by Aboriginal control of access to the archaeological record, with summary reference to the way in which concepts of archaeological and Indigenous significance are playing out in a long-term, multidimensional research project that we are conducting in Williams's traditional country in northeastern Australia. It should be noted that the terms "Indigenous" and "Aboriginal and Torres Strait Island" are used here interchangeably.

The scene

As in many other parts of the world, significant numbers of Indigenous people in Australia remain profoundly skeptical of, if not openly hostile toward, archaeology and anthropology (for example, Layton 1989a, 1989b). Indeed, they are suspicious of any scholarly disciplines which involve study of their bodies, lives,

or histories, or the environments in which they live and upon which they depend for physical or spiritual sustenance, owing to the perceived complicity of such studies in their past and, some would say, continuing colonial subjugation. Penetrating this skepticism and suspicion to establish equitable and mutually beneficial working relationships is no easy task, even when Indigenous scholars are involved in the research. One reason for this is that a standard archaeological response to Indigenous people's qualms has been that archaeology is ethically unproblematical and of obvious benefit at the local community or individual level because the knowledge it generates benefits all humanity (for example, Mulvaney 1981, 1991). Born of the Enlightenment and rising with renewed vigor from the ashes of the Nazi Holocaust, this universalizing, humanist response is unquestionably honorable in its motivation. It sounds perfectly reasonable to most Western and undoubtedly some non-Western ears, but it does not get much of a sympathetic hearing from some, perhaps many, Indigenous Australians: not in an era when Indigenous Australians are asserting wide-ranging cultural and intellectual property rights (for example, Janke 1998), nor when a noticeable proportion of Aboriginal and Torres Strait Island people, as is the case among Indigenous people elsewhere, assert that even the fight by non-Indigenous people against racism and human rights abuses is a form of paternalism; it is help they did not ask for and which they certainly should not have to be grateful for (for example, Langford 1983 for a much-cited Aboriginal response to universalizing humanism; also Bowdler 1988, 1992; Tasmanian Aboriginal Land Council 1996; Webb 1987; compare Langton and Megaw 1999).

Indeed, profound doubts have even been evident for some time in the Western academy, the main redoubt of Enlightenment principle. In addition to questioning anthropological and archaeological approaches to "the Other" (examples from a voluminous literature include Attwood and Arnold 1992; Kuper 1988; Trigger 1980, 1985), and to interrogating processes such as the acquisition by settler societies of a "deep past" through the appropriation of indigenous histories (for example, Allen 1988, Byrne 1996), parts of the academy have been pursuing a closely related debate, which sees scholars ask questions as profoundly challenging of post-Holocaust humanism as by "what principle short of imperialism do we insist on the application of civil or human rights in societies that have not come to these ideas through their own histories?" (Hammel 1994: 48; compare Handwerker 1997).

In this context, it does seem as if Australian archaeologists need Indigenous Australians much more than Aboriginal or Torres Strait Island people need archaeologists. As Murray (1992, 1993, 1996a, 1996b, 1996c, 1996d, 1996e, 2000) has been arguing for some time, however, both pragmatism and principle actually dictate otherwise in a postcolonial settler society such as Australia, with its emergent but not yet strongly developed pluralist ethic. Our country officially prides itself on being one of the most tolerant multicultural nations in the modern world. It must be borne in mind, though, that pluralist tolerance took a long time

to emerge in this country, despite a (not uncontroversial) leap in non-British European immigration rates a decade or so following World War II. It was only in the late 1960s and early 1970s that either the draconian policies which closely governed the lives of Indigenous Australians or the infamous "White Australia Policy" (that all but eliminated non-European and, indeed, non-British immigration) began to be dismantled in any significant way. Moreover, despite radical changes in the 1990s concerning legal approaches to the recognition of Indigenous Australian land and sea rights, there remains in Australia, among European Australians of British and non-British stock alike, a stubborn streak of what is at best indifference to Aboriginal and Torres Strait Island people and at worst is deeply rooted and sometimes violent racism.

In its less malignant form, this characteristic is evidenced by the fact that Aboriginal and Torres Strait Island issues, broadly defined, never rate highly in the lists of the public's major concerns recorded in "state of the nation" polls in the quality broadsheet press. At the time of writing, for instance, an article in the national daily the *Australian* (Marris 1999) described how "behind-the-scenes negotiations" were required to have a national summit on rural and regional development accept "that indigenous people are stakeholders in regional Australia," when delegates were principally concerned with health services, funding for the Australian Broadcasting Commission (the "Aunty" of Marris's title), and investment in rural and regional infrastructure by pension-fund managers. Even that paltry concession to cross-cultural reconciliation does not rate a mention in the same day's edition of the *Australian Financial Review* (Breusch 1999), which presumably did not see it as pertinent to the "real business" of the summit or the nation. In its more diabolical form, which is never far below the surface, the negative attitude toward Indigenous Australians is exemplified by the emergence and electoral success in the 1990s of One Nation, an overtly racist political party on the Far Right, which among other things is opposed to the much-belated legal and legislative recognition of Aboriginal and Torres Strait Island land and sea rights that has flowed from the so-called "Mabo decision" of the Australian High Court in 1993.

In this environment, the theorizing and practice of many non-Indigenous Australian archaeologists and heritage managers have deliberately or less consciously loaned support to Indigenous Australians' battles for self-determination. They have done so most effectively by demonstrating to the world at large, and to the Australian community in particular, that Aboriginal and Torres Strait Island people are not "unchanging people (with a very short history) in an unchanging land," as was commonly believed, and by making space for Indigenous views and bodies in research and heritage management agencies (for example, Moser 1995; also Murray 1996a). Bowdler's and like-minded approaches to the separation of archaeological and Indigenous significance and other interests, discussed further below, are a result of this general movement. So, too, are the views (and actions) of Mulvaney, which, although couched in what is now often seen as

the paternalistic neocolonial language of postwar universalizing humanism, are unquestionably motivated by a desire for mutual understanding and the need to support Indigenous self-determination (see Bonhady and Griffiths 1996 for extended discussion of Mulvaney's life and times).

It is against this background that Murray has developed a persuasive position that seeks to promote mutuality in a difficult postcolonial milieu. His ideas share the same general philosophical roots as all the other individual positions alluded to, but the manner in which they are expressed indicates a self-conscious attempt to steer between the rapids of radical separatism and the rocks of neocolonial appropriation. Demonized by some for what they perceive as his role in an unusually difficult repatriation case (for background, see Ross 1996 and papers following in that volume), Murray in fact readily concedes the primacy of Aboriginal and Torres Strait Island interests in Aboriginal and Torres Strait Island lives, cultures, and histories. At the same time, however, he steadfastly emphasizes the need:

> to manage a non-[Indigenous] interest in the human history of Australia . . . [and] to find ways of allowing non-[Indigenous] people to make meanings and confer values on these things, be they "relics" or "cultural heritage." Thus, heritage should not simply "evolve from the society whose heritage it seeks to preserve" (Sullivan, quoted in McBryde 1992: 265), but also evolve from the society in which such policies are expected to be effective. Effective policies have to be meaningful to both [Indigenous] and non-[Indigenous] people, a tall order if policy is developed on the assumption that the interests of [Indigenous] and non-[Indigenous] society can be isolated, and all the more difficult when ways of establishing the cultural significance of [Indigenous] heritage for non-[Indigenous] people (such as archaeology) are marginalized as "colonialist" or denigrated as subtle attempts at appropriating [Aboriginal and Torres Strait Island] Australia into a manufactured Australian identity. (Murray 1996b: 731)

Archaeological and Indigenous significance

In view of the foregoing, it might be surprising to learn that Australian archaeologists have not written much that explicitly concerns the relationship between archaeological or Indigenous significance. It should be evident from the discussion above that this is not because the matter is unimportant to them, or to the Indigenous Australians with whom or upon whose sites they work. Rather, it is because they have generally deferred to overseas and almost exclusively U.S. thinking on the matter, which has allowed them to advance until now on a reasonably sure footing owing to broad similarities between Australia and the United States with regard to relations between archaeologists and indigenous people (though see Lilley 2000a; Hammond 1981).

Two papers by Bowdler (1981, 1984) established the benchmark for the practical application of the concept of significance. As far as we are aware, that standard has been critically revisited only once in the mainstream Australian archaeological literature (Smith 1996), though the likes of Bowdler herself, Byrne, McBryde, Mulvaney, and Murray, all cited earlier, as well as others in the thick of it such as Pardoe (for example, 1990, 1992), have certainly continued to explore directly related issues. Like the mainstream literature and the gray literature of contract/consulting reports, publications from organizations such as Australia ICOMOS (International Council on Monuments and Sites) and the Australian Heritage Commission frequently mention significance, but very few deal with the issues in an analytical rather than descriptive manner (for example, Domicel and Marshall 1994; Johnston 1992). Because they are rooted in the same sorts of philosophies as Bowdler's perspective (see Kuper 1994 for a broad-brush critique of the anthropological aspects of these philosophies), none of the work to which we have just alluded materially alters the thrust of the position articulated in her two papers, which derives quite explicitly from well-known work from the late 1970s by U.S. scholars (for example, Raab and Klinger 1977; Schiffer 1979; Schiffer and Gumerman 1977).

What is it that Bowdler wrote that seems so effectively to have obviated the need for further critical discussion for so long? Her message in the two papers was and remains straightforward. Archaeologists, professionally speaking, should be concerned with "*archaeological significance,* which is to say, *scientific* significance" (Bowdler 1984: 1; original emphasis), measured in relation to timely research questions and representativeness. Precisely what can be considered a timely research question, or representative, she notes, varies through time and space in relation to the breadth and depth of scientific archaeological knowledge concerning specific issues, and thus significance is a "*mutable quality*" (added emphasis), as proclaimed in the title of her 1984 paper. Indigenous significance (a form of what is also called "ethnic significance" or "social value"), on the other hand, is explicitly left solely to Indigenous people to assess in relation to their own criteria, even if it is archaeological rather than other sorts of sites that are in focus, or if it is archaeological values which underlie Indigenous significance.

There is not a lot to argue with there, it might appear, but Bowdler's propositions are as much a product of their times in the history of archaeology and cultural heritage management in Australia, and of her central place in those times, as they are the result of more general logical principles. For a relatively brief period beginning in the 1980s, that history saw scientifically based, archaeological views of the past, rather than Aboriginal views of the past, positioned as a critical element of the national heritage. After that, demands for Indigenous self-determination began to supplant archaeological authority by emphasizing the needs and interests of living cultures rather than the need to preserve the material remains of past human action (Murray 1996b: 730; also

Byrne 1996: 97–98; Moser 1995). Clearly, Bowdler's position on the "separation of the powers" accommodates the imperatives of both of these major currents of thought in a dynamic environment. Nor, it has been pointed out, would anything less than the separation of archaeological and Aboriginal significance in this way make much sense in the Australian legal system. Hammond (1981: 56) draws attention to the fact that Australian jurists enforce relatively strict "evidentiary prohibitions against hearsay, opinion and concept." This means that Australian archaeologists are legally considered competent only to speak of archaeological matters in archaeological terms on the basis of archaeological facts. In short, an archaeologist's view on Indigenous significance (or vice versa) would generally not be legally admissible. This is no minor consideration when litigation is pursued by proponents or opponents of development, including Aboriginal and Torres Strait Island people, when the agenda of one of these parties has been frustrated by the other or the other's proxy (such as a consulting archaeologist).

Like Murray and an increasing number of other scholars in Australia and elsewhere (see papers in Torrence and Clarke 2000; also Bedford 1996; Colley and Bickford 1996; Lightfoot 1995; Lightfoot et al. 1998), we think the separation of archaeological and Indigenous interests in the past may be reaching the end of its useful life, at least insofar as it prevents the development of mutuality and shared understandings rather than reduces the appropriation of Indigenous authority (Murray 1996b: 733, 1996e: 210–12). Some will undoubtedly argue that archaeologists and Aborigines have been working together successfully for some time (for example, Clarke 1993; Davidson et al. 1995; Greer 1989). That is true, and we have no desire to diminish the accomplishments of those who have gone before us. The headway they made (and continue to make) helped create the situation which allows us to offer this paper. Nonetheless, we think it is fair to say that for the most part such cooperation still advances on the basis of mostly one-way compromises between more or less separate conventional archaeological and Indigenous agendas. On occasion, archaeologists give over all responsibility for deciding what happens and where to the Aboriginal community among whom the study is being undertaken. Even in cases where scientifically acceptable technical rigor is maintained in survey and excavation procedures, which may not always be assured, such action can produce scientifically incoherent results that may satisfy Indigenous curiosity about one or another matter, but that are unlikely to advance scientific knowledge to any degree or to matter to anyone outside of a small group of people. Much more commonly, and for that reason, much more unpromising in its one-sidedness, archaeologists try to interest and involve Indigenous Australians in the study of questions of almost exclusively non-Indigenous origin through the application of quintessentially Western philosophical and technical approaches (Murray 1992a). This means that generally there is little or no distinctively Indigenous input at either the conceptual or technical level. One simply winds up with Aborigines doing archaeology in pretty much the same way as their non-Indigenous colleagues, for reasons that the In-

digenous people involved may not fully understand, let alone regard as valid approaches to generating and managing knowledge about the past. Indigenous people frequently cooperate with archaeologists in such endeavors, not because they are particularly curious about, much less vocationally interested in, the archaeological past (although of course some are, on both counts). Rather, it is often more the case that they wish to help non-Indigenous Australians (archaeologists and the wider community alike) better appreciate Aboriginal and Torres Strait Island people, culture, and history in terms they, the non-Indigenous, can grasp. Some probably also hope that archaeologists might accidentally find something that bears on what many Indigenous Australians are usually much more interested in, namely the recent and especially the remembered past. This is why Pardoe (1990: 209), for instance, reports that a senior Aboriginal woman found a 150-year-old skeleton much more important than the 25,000- to 30,000-year-old Lake Mungo World Heritage Site skeletons, as the former "showed the continuity of Aboriginal culture well into the late 1800s" (Pardoe 1990: 209). In short, it is a case of two different groups of people having what each sees as a vital stake in the same thing (the archaeological record) for overlapping but mainly very different reasons, with the historically less-powerful group hoping that its cooperation with the other group will produce knowledge can be put to essentially nonarchaeological ends.

There must be a better way forward. There have been well-received Aboriginal histories which included some very limited archaeology, if only because they were undertaken by archaeologists (for example, Byrne 1984; Egloff 1990). Moreover, an increasing amount of (usually heritage-oriented) archaeology now exhibits explicitly community-based aspects, if only because it is mandated by law. Again, at the risk of generalizing, the archaeology in most such projects seems to have been directed not toward satisfying larger archaeological concerns through the *integration* of Indigenous interests (though compare Clarke 1993; Murray 1993; and papers in Torrence and Clarke 2000), so much as toward satisfying Indigenous interests viewed as something essentially *separate* from larger archaeological concerns. In other words, *mutual* interests are still rarely explored. The ongoing and often still terse if not acrimonious debate between archaeologists and Indigenous people in Australia and other parts of the world (for example, Clark 1998; Watkins 1998) suggests that the conventional interests of archaeologists in Aboriginal and Torres Strait Island pasts will never sit easily with the interests in those pasts of many, if not most, Indigenous Australians, regardless of how hard archaeologists try to accommodate Indigenous concerns within their own conventional interests, and regardless of how many Indigenous people study or otherwise participate in conventionally oriented archaeological activity. That some parts of the Australian archaeological community have not fully grasped, or at least do not take seriously, the implications of the elemental difference in perspectives that underlies this problem can be gauged by the fact that while heritage managers and research archaeologists for some years ac-

knowledged the primacy of Indigenous interests in this arena, as exemplified in the development by the Australian Archaeological Association of a code of ethics based on the proposition that Indigenous Australians own their own heritage (Australian Archaeological Association 1994: 129), members of the Australian archaeological community continue to debate the relative merits of the term "prehistory," both among themselves and with Indigenous people (Australian Archaeological Association 1999: 51–55). Like Bedford (1996: 432), we can do no better in this context than to quote Kirch and Sahlins (1992: 26), who noted "we believe that if archaeology is indeed to 'seek to understand and/or explain the processes by which cultural forms mediate social and ecological relationships among human populations in the post-1500 world' . . . , it cannot be hampered by academic divisions between prehistoric and historic archaeologies."

As Lightfoot (1995) argues for the United States, and the papers brought together by Torrence and Clarke (2000) demonstrate in relation to Oceania, clinging to a term such as "prehistory," useful though it may be in particular professional circumstances, as well as to vague, related concepts such as "contact," make it very hard to develop archaeological approaches to the past which advance rather than hinder relations with Indigenous people in an era when those Indigenous people have or are very rapidly developing the legal as well as the moral upper hand in the control of their pasts. This is particularly the case in Australia, where demonstrable relevance to land- or sea-rights claims is increasingly a major criterion for Aboriginal and Torres Strait Island approval of archaeological activity (see papers in Lilley 2000b). In short, increasing numbers of scholars are realizing that it is past time to make archaeological and Indigenous interests in the Indigenous past, and thus archaeological and Indigenous concepts of significance, more congruent, rather than simply continuing to try to fit the square peg of conventional "prehistory" into the round hole of Indigenous approaches to the past. Current thinking suggests ways this can be done without doing any real violence to the useful flexibility of Bowdler's general principle, which, after all, pivots on the notion of significance as a mutable quality. Moreover, it is likely to be able to be done in ways which accord with Australian jurisprudence, a useful thing, as we noted earlier, as we head into what will almost certainly be an increasingly litigious future, as the limits of native title (and archaeology's contribution to its determination) are explored.

Mutuality

The key to developing equitable and mutually beneficial working relationships between archaeologists and Indigenous people, and on that basis helping advance the development of a tolerant, just, and open society, is formulating an approach which recognizes the need of all parties (or, in the jargon, "stakeholders") to come to grips with the past so they can make sense of the present and head more confidently into the future. Thus, community-directed studies which

produce no discernible increase in archaeological understanding are of as little use as archaeological studies which ignore Indigenous perspectives in underpinning collaborative endeavors which allow all parties to develop and share their own understanding. This is not to say that archaeologists must somehow incorporate beliefs about the Rainbow Serpent into their explanations (unless accounting for Indigenous views of causality), or that Aboriginal or Torres Strait Island people must replace their origin stories with archaeological models such as the African Eve hypothesis. Rather, it is to say, as numbers of scholars have already done, that archaeologists should begin to see that if they can work out how they can bring their formidable analytical techniques to bear on matters of importance to Indigenous people, they will be able to produce much more comprehensive and thus more powerful archaeological understandings of the past.

This is particularly the case with regard to the nature and extent of the cultural continuities and discontinuities apparent in Indigenous cultures after European colonization. It thus bears directly upon matters of considerable substantive, methodological, and theoretical import in the archaeological study of culture contact and culture change (for example, Lightfoot 1995; see Bedford 1996; Colley and Bickford 1996; Murray 1993 for antipodean perspectives). Similarly, Indigenous people's understandings of their own past can be complemented or augmented by those aspects of archaeological research they might find relevant to their own interests, again perhaps especially in relation to links between the distant and more recent past. This has been happening to varying extents for some time now (for example, Pardoe 1990; Byrne 1998; Godwin et al. 1999), but as we think the debate about "prehistory" in Australian archaeology demonstrates, there is still a long way to go before mutuality replaces separatism as the dominant principle guiding Australian archaeology and its relations with Indigenous people.

How might mutuality work in the legal situation described earlier, which seemingly fosters the separate consideration of archaeological and Indigenous interests? As indicated above, Hammond (1981) notes that Australian jurists eschew hearsay, opinion, and concept, and thus generally would not tolerate an archaeologist presuming to speak for Indigenous people or, we imagine, vice versa. However, he also draws attention to the fact that

> often a court will rely on an expert witness even when the precise basis of his testimony cannot be determined. . . . [Thus, in an early land rights case, it was] held that evidence from an anthropologist in the form of a proposition of anthropology—a conclusion having significance in that field of discourse—was not inadmissible on the grounds of (a) hearsay in that the evidence was founded partly on statements made to the expert by Aboriginal people—so called reputation evidence given to a specialist in the field; (b) opinion founded on facts which were not apparent, since the facts were ascertained by the methods and described in terms appropriate to the

> expert's field of knowledge or (c) being conceptual in terms rather than factual, provided that the expert spoke in terms appropriate both to his field of knowledge and *the court's understanding*. (Hammond 1981: 55, original emphasis)

Although we are not lawyers, we surmise that such a ruling could also apply to an archaeologist discussing archaeological significance based on Indigenous significance, as well as to an Indigenous person presenting evidence regarding Indigenous significance deriving partly or wholly from archaeological significance, in cases where the evidence being tendered was based on demonstrably shared rather than more obviously separated understandings. A difference such as the last may be one reason why seemingly similar sets of archaeological evidence were treated so differently by the courts in the successful Miriuwung Gajerrong land rights case in remote northwestern Australia and the unsuccessful Yorta Yorta land rights case in "settled" southeastern Australia (see Murray 2000; Fullagar and Head 2000). In other words, shared understandings may have far-reaching implications for the relationship between archaeologists and Indigenous Australians before the law, and thus for the outcomes of legal action involving the interests of both groups.

Principles in practice

We have attempted to put our money where our mouths are through a multidimensional long-term study of Aboriginal archaeological and cultural heritage, which we began in 1994 in Williams's traditional country in northeastern Australia. The study, known as the Gooreng Gooreng Cultural Heritage Project, encompasses investigations of the Gooreng Gooreng language (Jolly 1994) and contemporary social landscapes (Clarkson et al. in prep.) as well as archaeological research (for example, Lilley and Ulm 1995; Lilley et al. 1996, 1998, 1999), cultural heritage management projects (for example, Lilley 1995a, 1995b), and the repatriation of cultural property from the study area that is located at the University of Queensland (Ulm and Lilley 1996).

The immediate origins of the project lie in Williams's appointment of Lilley as research coordinator, whom he charged with developing a research profile for the university organization he directs. Lilley was happy to accept the challenge of devising and managing the larger project in accordance with Williams's strategic visions for Indigenous involvement in university research and research in his traditional country, both of which he sees as a central part of his cultural responsibilities as a senior member of the Gooreng Gooreng and wider Aboriginal communities. Lilley was also happy to examine the area's archaeology as part of that larger enterprise. It has to be said, though, that the conventional "prehistoric" archaeologist in him was skeptical that there would be anything of particular archaeological significance to reveal in the area, at least at the level required to

attract the substantial levels of research funding necessary to undertake the work properly. This skepticism was because, although the archaeological detail of almost all of the Australian continent remains to be explored, most areas of obvious conventional research potential had already been assessed at least at a preliminary level. Such assessments of the coastal part of the study area (for example, Godwin 1990; Rowland 1987), where Lilley's investigations were initially targeted, had not discovered anything of immediate note. The findings sketched below rapidly proved that Lilley's skepticism was misplaced on two counts, the conventional and the more progressive, but that there were any findings at all is only because the personal- and community-level Indigenous significance of the area encouraged Williams to suggest his traditional country as a suitable place for Lilley to begin to build the aforementioned research profile.

Williams provided an academic foundation for the project in the form of the anthropological/ethnohistorical research he undertook as a postgraduate (Williams 1981). He maintains a keen academic interest in archaeology and the related disciplines included in the study, and sees the value for his people of building a comprehensive scientific record of Indigenous activity. However, he has always seen the Gooreng Gooreng project and the other research activities of the unit he directs as fitting in with Indigenous interests in general and with those of his family and language community in particular. During many stages of the project and particularly during the fieldwork, he has encouraged family members to involve themselves in the development of the growing body of knowledge being built up. He encourages his children and their generation to participate, and sees a definite role for himself culturally, as a senior man, to instruct them in their knowledge. Even those of his relatives who are older (and sometimes, but not always, some relatives of his children's generation), recognize his status and right to speak for certain tracts of country and defer to him when such matters are being discussed or need to be included in negotiations with government or miners and other developers. Those people, some whom have knowledge that he does not have, see the process of accompanying him and the project team into the field as a way to travel through the country with a man who has authority to speak. In that way, they gain confidence to speak of their own knowledge appropriately, in terms of being sanctioned to speak in particular forums.

This last sees Williams filling a role of a sort that is becoming increasingly important in Indigenous Australia. There is an Indigenous agenda that operates in tandem with the work of archaeologists, anthropologists, and other researchers in the current climate of assertion of Indigenous cultural and intellectual heritage rights. It sees Aboriginal and Torres Strait people who for one reason or another are in a position to articulate such rights seeking to assist others to build their knowledge of Indigenous life, culture, and history and to develop the skills and confidence to conceptualize and articulate their concerns and proposals concerning heritage, intellectual property, and other matters which affect their lives. In short, this agenda provides pivotal support for the larger project of Indigenous

self-determination. It is based on a simple premise. As prominent Aboriginal spokesperson Patrick Dodson (1985 cited in Keefe 1988: 77) stated in a newspaper article:

> There are difficulties in areas of Australia where Aboriginal people are absolutely surrounded in a sea of white people and do not have the opportunity to move or relate to the country that is theirs, but by the same token there is a fierce sense of Aboriginality that comes from knowing that across this country no one Aboriginal person stands in isolation.

Certain senior Aboriginal men from more remote communities in central and northern Australia have taken a particular interest in this phenomenon. They have actively sought to listen to the position of Aboriginal people from southern, "settled" Australia and, through their deep spiritual, religious, and other cultural knowledge, have assisted the latter in the interpretation of their country and their important places, and with their cultural expression. Senior man Wenten Rubuntja (1988 cited in Keefe 1988: 78) pointed out in *Land Rights News* that

> for Aboriginal people living along the coast where the white people took over first, they will be able to see that they are still part of the Aboriginal family. People down there might not know their language any more, but the emu story and the snake story goes all over Australia. When they see us dance, we can celebrate that we all belong to the songs that go across the whole of this country.

In recent years, Williams himself has been involved as pupil rather than teacher with Pitjantjatjara people from central Australia, who in the spirit of oneness have given him secret ceremonial knowledge. This situation arose from a visit of Pitjantjatjara people to the University of Queensland, where they, while interacting with Williams, said "your old people went before they could teach you properly" and expressed their intent to "help you [Williams] find your way again." In Williams's view, this presents him with heightened responsibilities to look after his traditional country and has added a dimension to the ethical responsibilities of non-Indigenous and Indigenous members of the Gooreng Gooreng project team. When conducting the business of the project and in determining how its findings contribute to the scientific record and to the capability of Indigenous people to enhance their understanding of country and claims to country, there are ceremonial, cultural, spiritual, and religious connections to an Aboriginal group (the Pitjantjatjara) many hundreds of kilometers away in Central Australia that now have to be considered. At the time of writing, just how Williams's connections with Central Australia may manifest themselves in relation to the responsibilities just mentioned had yet to become clear, though hints were discernible in preliminary discussions regarding ceremonial activity surrounding the repatriation of Gooreng Gooreng cultural property held in trust by the University of Queensland and the dedication of a piece of university land for Indigenous use.

Beyond such hints, the effects of colonization mean that there is an extremely tenuous understanding of the activities of Creation Ancestors, who may have linked groups of communities such as Gooreng Gooreng and Pitjantjatjara speakers. Regardless of current academic perspectives on the recent creation of "pan-Aboriginal" social identity (for example, Tonkinson 1990), in Williams's view there is no reason why present-day expressions of oneness and resulting gestures of ceremonial, religious, and spiritual support should necessarily be seen as anything but a contemporary expression of what has been in place in Indigenous Australia for millennia. The broader lesson in this is that researchers working with ideas of *country* and *place* or on issues which impinge upon such matters need to explore the ways in which these notions are conceptualized by Indigenous people, who may well appreciate them from perspectives and for reasons which do not differentiate between contemporary and "traditional" patterns of interaction and association.

It is for the foregoing reasons that, unlike many, if not most, cooperative projects undertaken in Australia to date (see Colley and Bickford 1996: 16), where community involvement and a shift from "prehistoric" toward "contact" archaeology emerged after the studies progressed (and, in some cases, at least partly because no material of significant antiquity was found), the present project was devised from the start as a multidimensional endeavor integrating Western archaeological/cultural heritage interests with Aboriginal interests. Thus, exploratory linguistic, social historical, and archaeological components of the enterprise all began more or less at once. Most importantly here, the concern to pursue issues of mutual interest and significance meant that as far as the archaeological record would allow, "prehistoric" and "contact" archaeology would both be integral to the study from the beginning.

The archaeological study focused on site survey and test excavation, first on the coast and very soon afterward in a gorge system at the western edge of Gooreng Gooreng country, more than a hundred kilometers inland. Owing to the nature of the evidence that has been located, the emphasis, until about 1998, was largely on the pre-European archaeology of the area, which on the coast extends back at least 4,000 years and in the gorge system at least to the last glacial maximum some 18,000 years ago. Critically, for attracting funding from sources focused primarily on conventional questions, the project is thus able to encompass many of the conventional "big" issues in Australian archaeology, such as the nature of human adaptation to the extreme aridity which characterized glacial periods in Australia, as well as post-Pleistocene developments, such as the (?non-) appearance of the so-called broad-spectrum revolution, which elsewhere led to agriculture and urbanism and, in at least parts of Australia, may have led to increasing regionalization and some degree of sociopolitical and economic intensification (see Allen and O'Connell 1995; Lourandos 1997; White and O'Connell 1982).

As work progressed, data relating to the post-European past began to be dis-

covered, linking the archaeology directly with contemporary Gooreng Gooreng social landscapes and the remembered past of living Gooreng Gooreng people. Ulm, who at the time of writing was pursuing his doctoral research on the coast, has thus been able to craft an archaeological sequence beginning some 4,000 years ago and ending only when virtually all Gooreng Gooreng people were removed from their traditional country by government decree early in the twentieth century. Of particular interest has been the discovery of evidence for post-contact cultural continuity in the form of flaked bottle-glass artifacts at sites which are located in places known to have been frequented by Aboriginal people in the historical period but which also have pre-European components of some antiquity (Ulm et al. 1999). Also fascinating is evidence for increasing regionalization and perhaps variations in patterns of social identity through time. This evidence is presently in the form of increasing use of local stone sources for artifact manufacture and the geographical restriction of edge ground stone axes of a specific, distinctive lithology to the area historically recorded as the traditional territory of Gooreng Gooreng speakers. While work in the inland has established occupation of Pleistocene antiquity, at the time of writing, we were yet to find much evidence in the gorge system relating unambiguously to the post-European period. A doctoral project, begun in 1999, will remedy that situation if appropriate data can be found. Preliminary analyses of the sparse rock art in the gorge has, however, provided some evidence to support emergent hypotheses concerning regionalization and social identity that have been generated by the coastal finds.

We also intend to undertake an archaeological and oral historical study of the Williams's family farm, which was acquired in a land ballot by his grandfather, in the coastal part of the study area. The aim is to build upon the other work of the Gooreng Gooreng project to determine the nature of continuities and discontinuities in Aboriginal life and behavior patterns between the pre- and post-European periods. This project is expressly designed to pick up where Ulm's sequence ends, and thus to more firmly integrate Indigenous interests in the recent, remembered past and archaeological concerns with culture contact and cultural change. In essence, we want to explore the archaeological dimensions of Williams's conviction that, although Indigenous groups and communities such as his own have experienced long and sustained intrusion by non-Indigenous people, to the point where the apparent lifestyle and behavior of those Indigenous people seem to be little different from "mainstream Australian culture," his family and a great many like it remain passionately Aboriginal in their identity and cultural expression.

Conclusion

In this paper, we have proposed that the separation of archaeological and Indigenous interests in the archaeological record of Indigenous life in Australia has, for

the most part, outlived its usefulness. It unquestionably played an important role in empowering Aboriginal and Torres Strait Island people, but Indigenous Australians have now achieved substantial levels of control over the Australian archaeological record through legislation and their efforts in helping develop professional codes of ethics and government regulations. In this context, it makes sense to us that archaeologists and Indigenous people develop ways to explore questions of mutual rather than separate significance. Our project in northeastern Australia is one of a small but increasing number of methodologically similar studies motivated by the conviction that Australian archaeology can only be strengthened by such an approach, which seeks to add depth, richness, and complexity to the relationship between archaeology and Indigenous interests in a way that can only help to improve our understanding of the variegated nature of significance *and* cultural heritage.

The critical issues in implementing such approaches are to have Indigenous people and archaeologists

- acknowledge that the other has sets of legitimate interests in the archaeological record which may not overlap to any great degree with their own;
- understand explicitly and in detail what those different sets of interests entail;
- accept that the questions of interest and approaches to their examination of one side should not dominate or diminish the interests and approaches of the other; and
- together determine areas of *mutual interest,* the investigation of which can contribute in nontrivial ways both to archaeological and nonarchaeological ends and thus help bridge the gap between the nonoverlapping sets of interests.

It seems clear from our own and others' experience that the only way this can be done is for archaeologists and Indigenous people to be involved together from the start in planning research projects of mutual benefit, rather than of primary benefit to one or the other party, with the benefits to the other tacked on as an afterthought. Archaeologists should not treat Indigenous people as just gatekeepers, who need to be convinced to let researchers past so that they can get on with their scientific work, but are then effectively forgotten until permit renewal time. Nor should archaeologists treat Indigenous people as if they were just volunteers, like any others on the field crew or in the sorting lab, to whom the universal benefits of rigorous archaeological research should be self-evident. Archaeologists should not turn to matters of "contact" archaeology, which may be of interest to Indigenous people, only when a search for material of more substantial antiquity and more obvious applicability to conventional archaeological questions proves fruitless. They should seek out and discuss with Indigenous people what archaeology does; what they, the archaeologists, want from the study; what the study might offer Indigenous people in relation to conven-

tional archaeological results; and, most importantly, what Aboriginal people think the archaeology might be able to do for them from a purely Indigenous, *nonarchaeological* perspective at the same time as it contributes to science in the way the archaeologists claim it will (such as Williams's concerns about caring for traditional country). Aboriginal people need to insist on this last matter even when it is not raised by archaeologists. Archaeologists should resist any urge to promise more than their methods and theories can deliver in such circumstances, but they should not be timid in exploring the boundaries of those methods and theories in determining just what it is they can offer.

Increasing numbers of Australian archaeologists have been doing some or even many of these things, in some cases for upwards of two decades. We argue, though, that they have not as a rule been imaginative enough in exploring how archaeology can contribute to nonarchaeological questions of Indigenous significance in ways that can also enrich archaeological method and theory. In other words, people have not explored matters of *mutual* significance with as much vigor as they might have done. This situation must change. The challenges to archaeology and its relationship with Aboriginal people, which are being raised with increasingly frequency and complexity as the discipline tries to keep its feet in the era of land and intellectual and cultural property rights, will make or break Australian archaeology in the new millennium. A whole raft of questions of concern to Indigenous people, encompassing ethnicity/social identity, and issues of colonization, culture contact, and cultural change, are being raised with a new urgency. None of these issues is new to archaeology by any means, but the social and political context in which they are being raised demands that archaeologists return to them in innovative ways. Australian archaeologists not yet awake to this reality, or not imaginative enough to explore new ways to carry archaeological approaches to such issues forward, will surely not survive very far into the future. Fortune favors the brave.

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14

Sacredness, sensitivity, and significance

The controversy over Native American sacred sites

Sherene Baugher

Introduction

Throughout the world native peoples are facing challenges to protect and preserve their sacred places. For example, the Aborigines in Australia; the Crees in James Bay, Canada; the Maoris in New Zealand; the Native Hawaiians; and the Saamis in Scandinavia have all faced the destruction of some of their sacred sites (LaDuke 1999; Matunga 1994; Mulk 1994; and Ritchie 1994). In Australia, for instance, the question of intellectual property rights and copyright issues has also been raised because of the wide commercial use of Aboriginal sacred symbols from sacred sites or from the people themselves (Johnson 1996). In urban areas, native sacred sites are threatened or destroyed as cities expand. In rural areas, traditional landscapes are altered by new highways, expanded suburbs, dams that flood the lands behind them, and the quest for resources such as timber, uranium, coal, and oil. Because none of these activities are likely to diminish in the near future, what can be done to preserve sacred sites?

In many countries, new construction can take place only after environmental assessments are made to determine the impact on both the natural and cultural environments. But who determines the significance of a sacred site? Usually it is the person or firm contracted to undertake the environmental assessment. Do native peoples have a voice in determining a site's significance? The answer depends on a country's laws, but more importantly, it often depends on *who* is implementing the laws. For example, within the same country a law can be interpreted differently by different agencies, with one agency interpreting the law in its most narrow and restrictive sense and another viewing the same law in its broadest meaning. If a site has been deemed significant, who determines whether the sacred site will be destroyed immediately, excavated by archaeologists and then destroyed, or preserved completely or, at least, partially? What voice do native

peoples, archaeologists, and preservationists have in these decisions? Are they working in tandem for the same goals or are they on a collision course? The answers are diverse and complex. In this chapter, I examine these issues only in terms of American Indian nations within the territorial boundaries of the United States. Selected case studies will illustrate the diversity of problems involved in addressing sacred sites and the range of potential solutions.

I use case studies to review two major issues: (1) the controversy over the excavation or preservation of sacred sites that are exclusively burial grounds or include burials within their boundaries and (2) the preservation of sacred sites that do not contain any burial grounds. This chapter is a greatly expanded version of a paper that I presented at a conference sponsored jointly by the National Park Service and the National Council for Preservation Education at Goucher College in March 1997. My conference paper focused primarily on who determines the significance of Native American burial grounds (see Baugher 1998)

For all nations, including American Indian nations, places set aside for the dead are regarded as sacred. Over the last fifteen years, much has been written about the reburial issue and the controversy over who determines the fate of Native American burial grounds (Jemison 1997; Price 1991; Swidler et al. 1997; Venables 1984; Vitelli 1996). While the controversies over burial sites may involve more intense beliefs, controversies over burial grounds are similar to and even components of the larger question: how should any indigenous sacred site be reviewed? This question in turn has a corollary: in any review of a sacred site, is there a role for an "ideal solution" in an increasingly pragmatic and materialistic global economy? The answers to all of these questions regarding sacred sites depend upon our understanding of "sacredness, sensitivity, and significance."

Sacredness

There is tremendous diversity in the Native American views of sacred sites because there are over three hundred different American Indian religions and cultures. That said, a "list" of categories that describe sacred sites would have to include the following (Deloria 1994; Kelley and Francis 1994; and Swan 1991: 68–72):

- any burial ground;
- places where spiritual powers are believed to reside;
- the specific locations where religious ceremonies are carried out, including healing ceremonies;
- the specific locations for rites of passage, purification, and spiritual renewal;
- sites for vision quests;
- shrines;
- astronomical observatories;

Fig. 14.1. U.S. map showing the locations of archaeological sites. Drafted by Daniel Costura and Jason Thompson.

- sites of important historic events; and
- sites where Indians go to obtain materials for use in religious practices: animals such as otters; fish such as salmon; plants such as yucca; rocks such as catlinite; water; and soil.

Some of the categories in the list above illustrate how some sacred sites are not identified by the presence of human-made materials such as pottery sherds or the outlines of homes. Archaeologists, developers, or federal government officials would err if they regarded such a site as having little or no sacred significance. The absence of human-made objects may actually be one of the reasons the site has remained sacred. Because the fates of American Indian sacred sites are most often made by people who are not followers of an American Indian religion, the ethical sensitivity of such decision makers should be encouraged so that Native perspectives are included.

Sensitivity

Whether or not a site contains burials, Native Americans and archaeologists may all agree that a site is significant but may arrive at this conclusion for different reasons. Recognizing these different perspectives is essential if a cooperative, common plan is to emerge. An example of different perspectives has been defined by archaeologists Roger Anyon and Kurt Dongoske. Anyon worked for the Zuni tribal government in New Mexico and Dongoske worked for the Hopi tribal government in Arizona. These two scholars note how archaeologists, whose frames of reference are primarily scientific, consider a site significant if it has "a primary importance for yielding quantifiable data vital to the scientific understanding of past human lifeways and adaptation" (Dongoske and Anyon 1997: 189). But they also recognize that the Indians perceive sites in ways that are beyond these academic frames of reference:

> [T]he Hopi and Zuni view ancestral archaeological sites as being imbued with life; they are inhabited by the spirits of their ancestors who once occupied the site. Moreover, these archaeological sites are not conceptually differentiated from the present, but are viewed as important living spiritual places that maintain an intrinsic and vital role in the continuance of the Hopi and Zuni cultures and lifeways. (Dongoske and Anyon 1997: 189)

Furthermore, the question of significance is perceived differently by different Indian individuals. Some individual Indians have focused primarily on their nation's traditional culture and religion. Other individual Indians may have chosen to emphasize assimilation into the American mainstream, including an adherence to a Christian religion that may challenge what that Indian individual should properly regard as "sacred." Different perspectives regarding a site's significance can therefore exist within an Indian community as well as between an

Indian community and outsiders such as archaeologists. Any of these differences can lead to a controversy over whether a site should be excavated by archaeologists or preserved completely intact.

Significance

The process that may eventually lead to the preservation of a sacred site begins with an analysis of a site's significance. But who determines this significance? Who determines the fate of each Native American sacred site? Are Native Americans consulted? Do Indians simply have a voice, as does any concerned group, or do they have a direct and substantial vote in determining the fate of their sacred sites? Once a determination of significance is made, who decides how the site will be preserved? Are Indians given access to their site? If the site is on government property and is being interpreted to the public, do the Indians have a deciding vote or even a voice in what is being presented to the public?

In terms of historic preservation, the United States government ultimately determines the significance of a site. However, as part of the process of reaching that determination "interested parties" are allowed to have a "voice" and speak at public hearings or submit documents to aid personnel in government agencies in reaching their determinations. In sacred sites controversies, it is clear who has the authority to speak for the government agencies, professional organizations, or lobbyist groups. In addition, academic criteria can be used to determine if someone is a professional archaeologist. But who determines who represents the Indians? There are over 300 different American Indian cultures and religions in North America. Archaeologists and preservationists who are reluctant to deal with Indians often claim that they do not know which Indians should be contacted. They ask, "Who really speaks for the Indians?"

Who represents the Indians?

Federal and state laws recognize the actions of tribal councils. For example, the National Park Service may consult with many people, including Indian religious leaders, but is required by law to work with the "legally empowered entity," that is, the tribal governments. Because the federally sanctioned tribal governments are still likely to be in business for years to come, it is important to understand why these governments were created and why there are internal conflicts within Indian nations. Tribal councils, exemplified by the one imposed by the federal government on the Navajos in 1923, were put in place so that non-Indians could define groups of Indians who could sign oil leases and other contracts, allegedly on behalf of all their people (Butler 1996: 380; Taylor 1980: 71). This process went on gradually until 1934, when the Roosevelt administration devised, in the *Indian Reorganization Act,* what it believed was a reasonable compromise: Indians would be allowed to continue their customs in exchange for adopting govern-

ments modeled after the federal government (Hauptman 1992). The new tribal governments were run by majority rule rather than by consensus and were often forms of government that were alien to the traditional cultures (Philip 1977; Taylor 1980). At the time, this seemed benevolent, but it was not until 1934 that the United States extended the right to freedom of religion to Indian nations. Prior to 1934, federal officials on Indian reservations, eager to see the Indians Christianized, harassed Indian religious leaders and often forced Indian religious ceremonies underground (Deloria 1994). Ironically, a major reason these governments created tensions within reservations was because the Indian Reorganization Act separated church and state, whereas traditional Indian governments almost always integrated religion and politics (Tullberg 1982). As Indians complied with the Indian Reorganization Act, a division occurred on many reservations, with the assimilated Indians running the tribal government and the traditional Indians left out of the tribal decision-making process (Tullberg 1982; Deloria and Lytle 1984). This division between traditional and assimilated Indians does effect the issue of sacred sites and the protection of these sites.

While there is not a pan-Indian response in the case of the treatment of the dead, most traditionalists are in fact preservationists, and they support the preservation of burial grounds and sacred sites. The traditionalists are also usually opposed to the removal of human remains and grave goods to museums (Echo-Hawk and Echo-Hawk 1991; Mihesuah 2000). However, there are some exceptions. Sometimes, but not often, Indian nations do not want the bodies returned. In contrast, some assimilated Indians see museums as viable alternatives for the preservation of human remains and burial goods. These disputes within Native communities reflect a pervasive split throughout all of "Indian Country," affecting virtually every aspect of Indian life, including the issues of preservation. This split is in part a consequence of federal policy. Throughout most of the nineteenth and twentieth centuries, federal policy imposed assimilation through federally funded schools in which Indian customs were downplayed and even denigrated. This policy was redirected in 1978, when Congress asserted that the Bureau of Indian Affairs should "facilitate Indian control of Indian affairs in all matters relating to education" (United States Congress 1990: 292; Prucha 1984: 1103–6; Trennert 1988: 206–13). Another major reason for this division within tribes is that, in the twentieth century, federal policies and laws replaced traditional Indian governments, imposing in their place tribal governments patterned after Euro-American models. Often shunned by traditionalists, these tribal governments are staffed primarily by those Indians who are more assimilated into mainstream America. If you ask the opinion of these two groups regarding the preservation of burial grounds and sacred sites, you are likely to get different answers.

Because these divisions remain today, archaeologists and preservationists need to be very clear about who we are contacting regarding religious issues; is it the political leaders of federally sanctioned tribal governments or the religious leaders or both? Are the leaders we are working with Christians or traditionalists

or both? To mitigate problems, we should apply the same approach we use when contacting religious leaders of a Euro-American community. For example, if we were dealing with the preservation of an Orthodox Jewish cemetery in New York City, we would contact the religious leaders of an Orthodox community, not members of "Jews for Jesus" or Christian politicians. With Native American sites, we should also contact the traditional religious leaders, even though the law requires us simply to contact the legally recognized tribal governments. In any discussion regarding Native American sacred sites, many controversies could be avoided if archaeologists, preservationists, and government officials talked to traditional religious leaders as well as to the federally recognized tribal leaders. However, some archaeologists and preservationists have tried to avoid dealing with traditionalists by declaring that they cannot be sure who the religious leaders are, because from their Western perspective they believe that "any Indian can claim to be a religious leader." Of course, the Indian leaders in any tribal government, no matter what their beliefs, are members of their community, and they know who are and who are not the traditional religious leaders. Skeptical non-Indians could begin to sort this out by asking the tribal government leaders. Today, these same reluctant archaeologists and preservationists also claim that they do not have to meet with traditional religious leaders because the revised preservation regulations, the 36 CRR 800 Regulations for Section 106 of the National Historic Preservation Act (see Advisory Council on Historic Preservation, no date), only require meetings with each Indian nation's Tribal Historic Preservation Officers, who may or may not be members of the reservation's traditional religion. However, the revised preservation regulations do not state that government personnel should meet *only* with tribal preservation officers, nor do the revised regulations forbid meetings with traditional religious leaders. Since the input of religious leaders will increase the knowledge base, the religious leaders' participation will enhance the preservation of sacred sites.

Burial grounds

In 1990, the federal government enacted the *Native American Graves Protection and Repatriation Act* (NAGPRA). This act only applies to federal lands and to institutions receiving federal funding. Legal scholar H. Marcus Price III noted that prior to this definitive federal law, the primary goal of federal laws was to preserve any human remains or burial goods in a museum or university, and not to keep burial sites intact or to return human remains and burial goods to an Indian nation (Price 1991: 118). Some states are now enacting laws in the wake of NAGPRA, but the consistency of these laws varies (Price 1991: 43–115). And even though laws that are more sensitive to Indians now exist, that does not mean that the spirit of the laws will be followed or that American Indian religious views will be respected. Attorney Price summarizes the roles of both non-Indians and Indians in the failures to enforce legal protections as "factionalization among

residential aboriginal communities, inadequate funding of preservation programs on the part of the state legislatures, and a lack of support given to enforcement of the laws by the resident professional community" (Price 1991: 118). As Price notes, while some of this failure is due to pressures from non-Indians, some failures are due to factions within Indian communities. These factions can divide clans and families as well as the community as a whole. For example, this factionalism is based at least in part on the different interests and viewpoints held by those Indians who are assimilated and who often adhere to a Christian faith in contrast to those held by Indians who maintain traditional native religions and customs.

Native Americans, archaeologists, and preservationists all are in agreement: burial sites are significant. However, the disagreement is in how these sites will be handled; will they be excavated or preserved undisturbed? Some archaeologists believe that before an Indian community is included in the decision-making process, Indian leaders need to demonstrate direct genealogical descent from the people buried in the ground to the contemporary Indian community. However, that same standard of genealogical affiliation was not applied to African American communities in 1991 with the discovery of an African burial ground on the property of a proposed site for a new federal office building in New York City. Members of the African American community, including New York City's first black mayor, David Dinkins, were active and vocal participants in two-year-long discussions which determined the fate of the colonial burial ground and the bodies and the footprint of the office building (Harrington 1993). However, no one dared to demand that the diverse groups of black leaders, which included the outspoken Reverend Al Sharpton, had to demonstrate their direct descent from those individuals buried in this eighteenth century graveyard. The reason was clear: the African American community in New York is a powerful voting block.

United States preservation laws allow interested parties to have a voice, but these laws assert that the final decisions are the sole responsibility of the government. While this is a logical and legal assertion of federal sovereignty, in actual practice powerful lobbying groups can and do exert a de facto veto, as demonstrated by the African Americans who forced the federal government to alter its building plans in order to protect New York City's colonial African Burial Ground. Such a de facto veto is not an option for Native Americans because they only comprise 3 percent of the population (divided up among more than three hundred tribes). Because Indians are not a powerful voting block or lobbying force, their opinions can be ignored both legally and politically. Whether this is "just" or "ethical" is another matter. In this context, the only recourse Indians seem to have is militant publicity. As former New York State Department of Transportation Commissioner Raymond Schuler succinctly put it: "State Officials only seem to take Indians seriously when the Indians have rifles in their hands" (Hauptman 1988: 102).

Another way some officials have ignored Indians is to meet only with mem-

bers of "federally recognized tribes." The reason given is to avoid "New Age" groups claiming to be Indians, such as the non-Indian followers of Sun Bear. However, in the Midwest and the Far West, including California, legitimate Indian nations, through no fault of their own, were "terminated" as "federally recognized tribes" in the 1950s. At that time, the federal administration believed that all Indians should be assimilated into mainstream American culture and that the existence of their reservations and their treaty-protected legal status was an impediment to the goal of forced assimilation (Hauptman 1992: 329). While most Indian nations maneuvered to avoid termination, historian Laurence Hauptman (1986: 45) notes that "the 'termination laws' of the Truman and Eisenhower administrations ended federally recognized status for 109 Indian groups." In addition, Hauptman (1986: 45) notes that the laws removed the restrictions on 1,265,801 acres of Indian land, thus allowing for easier leasing and sale of this land. Today, members of these terminated tribes cannot fight effectively for the protection of their sacred sites because they lack legal status. Therefore, it is important to determine if a local Indian nation was terminated and to allow their religious representatives to be part of the discussions regarding the significance and preservation of their sacred sites.

The professional archaeological community is still divided on the burial issue. Two federally funded journals, *CRM* and *Common Ground* (formerly known as the *Federal Archaeologist)* have published positive examples of cooperation between Native communities and archaeologists. In addition, the newsletter for the Society for American Archaeology (SAA), the *SAA Archaeological Record* (formerly known as the *SAA Bulletin),* has been publishing articles and news briefs about examples of cooperation between archaeologists and Native Americans. The SAA has also published a book, *Native Americans and Archaeologists: Stepping Stones to Common Ground* (Swidler et al. 1997), containing case studies of cooperation. While I am happy to see a growing number of culturally sensitive archaeologists, my experience in the northeast has been that there are still many field archaeologists who do not agree with the new legislation and reluctantly comply with the law. Anthropologist Carol Abatelli (1993) notes that because reluctant archaeologists notify American Indian communities of the discovery of burial grounds at the last possible moment the law allows, the work takes on crisis management proportions. Many of these confrontational situations could be avoided if Native communities were treated with respect and were informed at the beginning rather than the end of the process.

Case study: Archaeologists and Native Americans working together in New York City

From 1980 to 1990, I was the city archaeologist for New York City. Along with my staff in the City Archaeology Program, I excavated sites that were endangered but did not trigger any legally mandated archaeology. I also evaluated all of the

legally mandated contract archaeology projects within New York City. If I thought that a site might contain a Native burial ground, then I met with the leaders of New York City's American Indian Community House, which represents Indians living in the city; some 14,000 in 1980 and over 30,000 by 2000. I also met with each site's developer, the developer's architect, and the officials of any city agencies which were involved. Together, we planned how the discovery of a burial would be handled. Because these projects were being undertaken early enough in the planning process, in situ preservation of a burial ground was possible. If necessary, the redesign or the resiting of a new building could be undertaken without financial hardship (New York City Landmarks Preservation Commission 1982).

Some archaeologists believe that problems with an Indian community are bound to occur whenever human remains are discovered during the excavation or construction phase. The Iroquois and Algonkin people that I have worked with have not been "either/or" in their approach, and there has been a middle ground reached which was not in violation of their traditional religious beliefs. If archaeological excavations are undertaken, the site for reinternment and a reasonable length of time for the scientific study of the bones must be negotiated with leaders of the Indian community before the archaeological excavation continues. In 1986, human remains were found by construction workers during the renovation of the interior basement of a building, the John Street Methodist Church, a landmark in the Wall Street area of lower Manhattan (New York City Landmarks Preservation Commission 1986) (figure 14.2). The construction project was being undertaken "as of right," meaning it was not a discretionary action and did not trigger any federal, state, or New York City environmental or preservation laws, which would have required an archaeological assessment prior to construction. Nevertheless, the minister contacted me because he wished to be ethical, and he was also genuinely interested in the history of his church grounds. The bones uncovered could have been associated with a white Methodist from the eighteenth century or with an Indian buried prior to European contact (Baugher et al. 1991). I met with leaders of the American Indian Community House as well as with the minister of the John Street Methodist Church and his superiors. Religious leaders from both the white and Indian communities agreed that they wanted the bones reburied, but they were willing to have physical anthropologists study the bones as long as none of the bones were destroyed or treated in a disrespectful manner. Also, they wanted the City Archaeology Program to undertake an emergency excavation to determine if any other bones or intact bodies were on the site. Members of the American Indian Community House volunteered to participate in the excavation with us. No other bones were unearthed. Because of the limited number of bones and types of bones found, the physical anthropologists were unable to determine the racial background of the individuals. Therefore, the bones were reburied on the Methodist church property in a joint Native American and Methodist reburial ceremony. All parties

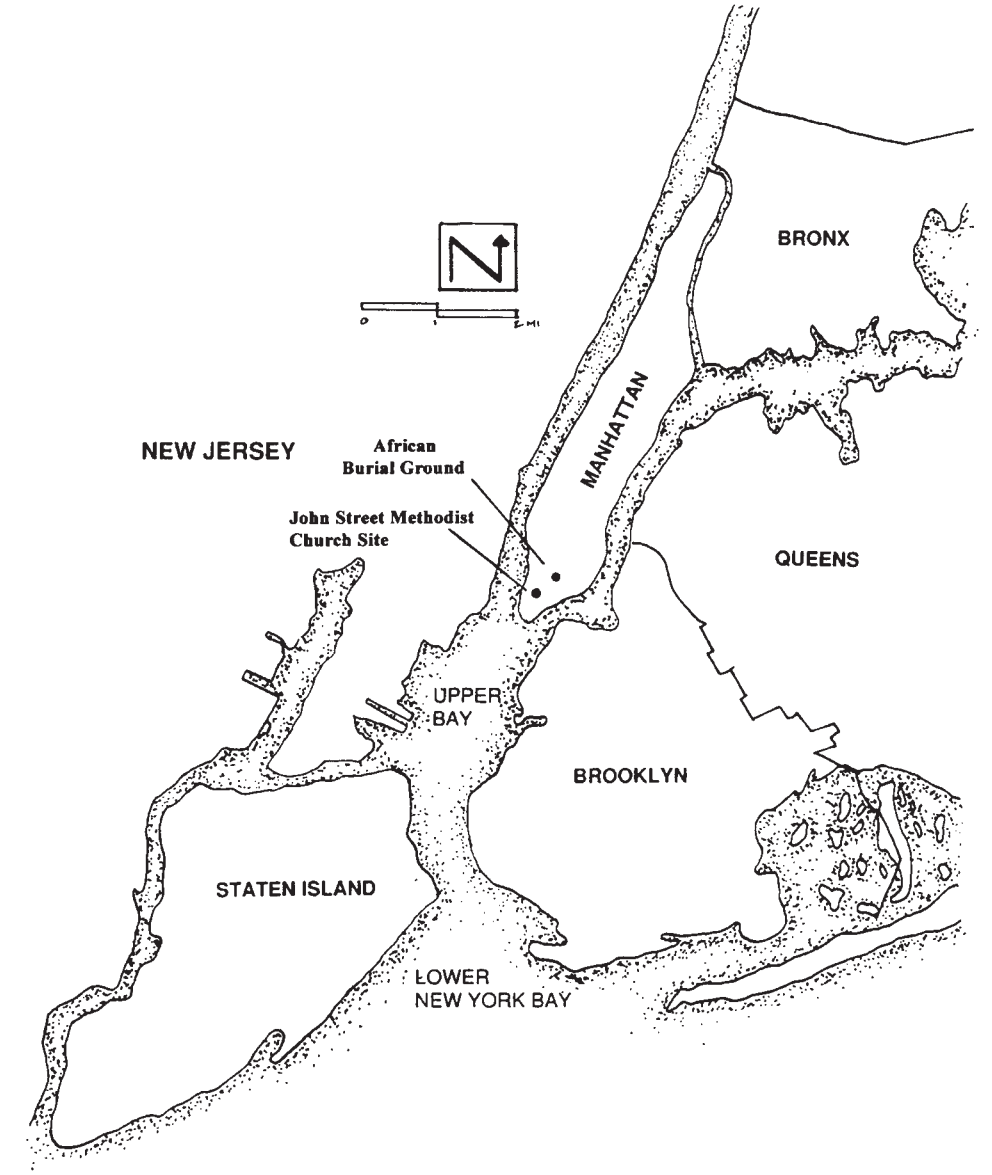

Fig. 14.2. Map showing the location of the African Burial Ground and the John Street Methodist Church site in New York City, Borough of Manhattan. Drafted by Daniel Costura and Jason Thompson.

involved, including the archaeologists and physical anthropologists, felt this was a win–win situation. It worked because all religious views were heard and respected.

Case study: Native American participation in the proactive preservation of an upstate New York burial ground and town site

The approach of working cooperatively with the local Indian community can succeed in large urban areas, small cities, or even in rural counties as long as all parties are committed to working together at the start of the project and all have agreed to the same ground rules. An example of proactive preservation is the Inlet Valley site in Ithaca, a small city in the Finger Lakes area of central New York state (Baugher and Frantz 1998). The 200-acre parcel of farmland had been rezoned for residential development. The Town of Ithaca asked archaeologists from Cornell University to evaluate the area (through documentary research and field-testing) and determine if the parcel contained any archaeological sites (Baugher and Quinn 1995). This was not legally mandated archaeological work and was in advance of any proposals for development. It was proactive planning by the Town of Ithaca, plus cooperation and participation by a university in its local archaeology.

Because the Inlet Valley project was situated on traditional Cayuga land, archaeologists and planners met with a chief of the Cayugas (who also represented the wishes of the traditional religious leaders) before the start of the excavation. The Cayugas wanted their cemeteries preserved and protected, not excavated. The Cayuga leaders, the town planners and the Ithaca Town Board, the archaeologists, and the landowners all agreed that, if an Indian burial ground was found, it would not be excavated but would be preserved. Because all parties agreed on how a burial ground was to be treated if one was discovered, there was no eleventh-hour crisis. Today, a burial site remains preserved on private property. In addition, archaeologists identified an eighteenth century Tutelo village, Coreorgonal, and its surrounding farmland. In September 2002, Tutelo, Seneca, and other Iroquois leaders gathered with town officials and members of the Ithaca community to commemorate the establishment of Tutelo Park to preserve some of the Tutelo land. Cooperation can work even in towns and small cities.

Sacred sites that are not burial grounds

Burial grounds are sacred sites, but not all sacred sites are burial grounds. However, as with burial grounds, archaeologists may be called in to evaluate and excavate property containing a sacred site. Too often, developers and government agencies see archaeological excavation as a simple, quick way to mitigate the impact of the proposed development and thus remove any preservation problem. However, determining the significance of a sacred site is not as simple and straightforward as determining the presence or absence of a burial ground.

Preservationists must now evaluate American Indian sacred sites as part of the

general federal category "traditional cultural properties." (For more information on traditional cultural properties, see Parker and King 1990). These sites are diverse. Most Indian nations do not separate spirituality from historical events; thus sacred sites can reflect a wide range of sites. The site of a Huron village, Tkahaanaye near Kingston, Ontario, holds sacred meaning to the Iroquois of the northeast because this is believed to be the birthplace of Deganawidah, the great Peacemaker, who founded the Iroquois Confederacy (Wallace 1994: 33). The site where Deganawidah met a powerful woman named Jigonhsasee and instructed her regarding the future roles of the clan mothers within the new confederacy is believed to be at Ganondagan, near Victor, New York (G. P. Jemison, personal communication; Wallace 1994: 34–41). Ganondagan is New York's first and only state-supported Indian heritage site (Hauptman 1988: 120). And at the Onondaga territory near Syracuse, New York, the Iroquois' nineteenth-century religious leader Handsome Lake lies buried (Parker 1968: Plate 9).

To an outsider, sacred sites often do not look different from the surrounding secular landscape. Developers and government officials often view the sacred land as simply undeveloped, and numerous justifications are put forward for development. Because some sacred lands do not contain religious buildings, it is often difficult for non-Indians to understand why this one location is so important and why the negative impacts of the proposed development cannot be mitigated by simply giving the Indians access to other land nearby. However, that is like saying to an American that you are going to bulldoze the Civil War battlefield Gettysburg. After all, it, too, is open land; but in exchange you are going to set aside another property nearby. In both cases, an exchange of land is not acceptable because the other land is not hallowed ground.

Case study: What are sacred sites? Mount Graham, Arizona

Since it is often difficult for non-Indians to determine the location of sacred sites, Native Americans should be consulted. However, this is easier said than done. Some Indians are still hesitant and reluctant to work with non-Indians in revealing the locations of sacred sites. They fear that the sacred sites will not be protected or that any information that is published will guide looters to the area. Some Indians are especially distrustful of archaeologists and preservationists because of the long-term controversy over the excavation or preservation of burial grounds. The controversy over Mount Graham is an example of what can happen if Indians do not become involved in a project when a determination of significance is being made.

Mount Graham is located in the Coronado National Forest in southeastern Arizona, about seventy-five miles northeast of Tucson, Arizona (as the crow flies, but there is no direct roadway between Tucson and Mount Graham, so the vehicular route is approximately 140 miles). The traditional Apaches believe that this mountain is home to the Ga'an spirit dancers, a place to gather medicinal plants, and a place for religious ceremonies, including healing and puberty cer-

emonies (Martin 1993: 47). Apaches and anthropologists have noted that the mountain also contains burial grounds and ancient shrines (Martin 1993: 47). Unfortunately, the mountain became the proposed site for a cluster of seven telescopes known as the University of Arizona's Mount Graham Observatories. In the late 1990s, the erection of three of the seven telescopes began, one by one. Sometime in the early twenty-first century, despite funding difficulties, the first three telescopes and their associated buildings will be completed, all on the religious sites of the San Carlos Apache Indians, whose reservation borders the mountain. Many complex reasons explain, if they do not justify, how all this came to be.

The University of Arizona's partners in the project are the Vatican and Germany's Max Planck Institute. The role of the Vatican is ironic at several levels. When Pope John Paul II visited the American Southwest in 1986, he urged Indians to fight for their land rights (Martin 1991: 2). Later, however, Jesuit priests, who officially represented the Vatican, denied that Mount Graham is a sacred site. Although there was ample evidence from the Apache and from anthropologists to the contrary, Father George Coyne stated, "there is to the best of our knowledge no religious or cultural significance to the specific observatory site" (Martin 1993: 47). Father Coyne stated that the Apache beliefs (regarding Mount Graham) represent a "religiosity to which I cannot subscribe and which must be suppressed with all the force we can muster" (Salerno 1993a: 9).

However controversial the role of the Vatican and its representatives may be, the advocates of the observatories succeeded, at least in part, because of the Apaches themselves. Indeed, the entire story is one of irony and paradox. In 1985, the United States Forest Service sent out notifications regarding the period for public commentary on the environmental review reports for the project (Martin 1993: 47). In 1985, within the required commentary period, the San Carlos Apache Tribal Council (the federally recognized tribal government) responded regarding their concern over mineral rights on Mount Graham. But the tribal council did not register any concerns regarding cultural or religious issues (Cusanovich 1996: 4). The Apaches' religious leaders and traditionalists, who were not part of the tribal council, did not protest until four years later (Martin 1993: 4). In 1990, the Apache Tribal Council finally voted to oppose the Mount Graham project (Cusanovich 1996: 4). In 1991, a lawsuit was filed against the Forest Service for issuing the permit to build the observatories on a sacred site. This lawsuit was brought by the Apache Survival Coalition, an alliance that included Apaches, anthropologists, and environmentalists, but did not include the Apache Tribal Council (Cusanovich 1996: 4). In 1992, the district court ruled against the Apaches, stating that the Forest Service had complied with all the pertinent laws (Martin 1993: 54). In 1993, the Tribal Council withdrew its opposition to the Mount Graham telescope project and instead voted to take a neutral position (Salerno 1993b: 9). In 1994, an appeals court ruled against the Apaches, saying that the Indians had "forfeited their claim" because of an "inexcusable delay":

the Apaches had submitted critical information a year after a building permit was issued (Giblin 1994: 52A). The only hope left to stop the project was to try to protect Mount Graham as the habitat of the endangered Mount Graham red squirrel. However, in 1996, President Clinton signed into law a waiver of the Endangered Species Act. Clinton's action allowed the University of Arizona to begin building the telescopes and destroy the Apaches' sacred site (Meadows 1996: 4A). By 2002, two telescopes had been built, and a third one is under construction.

A final irony is the fact that the Apaches can gain access to what is left of their sacred site, but only with written permission from the University of Arizona. "Prayer permits" must be obtained at least forty-eight hours prior to an individual coming to worship on Mount Graham (*Indian Country Today* 1998: B10). The lack of comment by the Tribal Council during the initial commentary period, their unwillingness to join in the lawsuit, and later their neutral position may have undermined the traditional Apaches' position in court and in the press. Unfortunately, the internal divisions within the San Carlos Apache tribe plus the Apaches' initial reluctance to discuss and reveal the locations of their sacred sites on Mount Graham all caused untimely delays and undermined their case. If the University of Arizona and its partners decide to move to phase two (the construction of four additional new telescopes), then the new project will require a full environmental review (Rotstein 2001: 1). Perhaps in this next phase of the Mount Graham project, the Apaches will be united in their response.

Should sacred sites offer equal access to everyone?

Case study: The Bighorn Medicine Wheel controversy, Wyoming

Medicine wheels are wheel-shaped arrangements of stones that are places of spiritual power where religious ceremonies and mediation occur (Gill and Sullivan 1992: 187). About 150 "medicine wheels" survive north of Mexico (Cox 1999: F1). Most of them are in southern Alberta and Saskatchewan, but the largest is Bighorn Medicine Wheel (Nikiforuk 1992: 52–53). Bighorn Medicine Wheel is located in Bighorn National Forest in northern Wyoming, about 130 miles east of Yellowstone National Park. Archaeologist David Hurst Thomas describes Bighorn Medicine Wheel:

> a stone circle (or "wheel") nearly 90 feet in diameter, built atop an isolated peak 9,640 feet above sea level. Inside are 28 unevenly spaced "spokes" each radiating out from the central "hub," a central stone cairn about 15 feet across. Five smaller cairns dot the periphery. (Thomas 1994: 237)

Bighorn Medicine Wheel is one of the most sacred sites in the northern Plains and is used by many tribes for various religious purposes (Walker 1991: 109). For

example, William Tallbull, elder of the Northern Cheyenne tribe notes that the site was and still is used as a place for vision quests (Thomas 1994: 238).

Archaeologists, while agreeing that Bighorn Medicine Wheel is significant, have debated about the function and symbolism of the site. Bighorn Medicine Wheel has been called an American Stonehenge because some scientists believe it has an astronomical alignment. Astronomer John Eddy claimed that it aligned with sunrise on the summer solstice (Eddy 1974). However, while some scholars have supported Eddy's claims, other scholars have questioned this astronomical interpretation of the site (Williamson 1984: 201–11; Aveni 1997: 73). Some archaeologists believe the site may be linked to the Sun Dance and that the "wheel" may even be the remains of an actual Sun Dance lodge (Snow 1976: 97–99). Other interpretations as to why it was built include, the rock cairns are grave markers; it is a directional aid for travelers; it marks a boundary; and it is a depiction of a stone turtle (Thomas 1994: 237–41). Regardless of the interpretations of the site, everyone agrees that Bighorn Medicine Wheel is significant, and the site has been designated as a National Historic Site.

The controversy surrounding Bighorn Medicine Wheel is not in its designation but in its preservation. Because of the astronomical association, Bighorn Medicine Wheel has become a mecca for New Age followers. In the 1970s, the influx of visitors became so great that the Forest Service had to erect a tall barbed-wire fence around the site in order to protect it from desecration by tourists (Cox 1999: F1). For years, the controversy has been over access to this sacred site. Native Americans, who come to Bighorn Medicine Wheel for religious ceremonies, formed the Medicine Wheel Alliance to challenge the government over who should have access to this site (Nikiforuk 1992: 60). They questioned whether Indian nations have to file the same permits as non-Indians for access to the site. Should a tribal request to hold a religious ceremony at their own sacred site be put through the same layers of bureaucracy and the same waiting periods as nonreligious requests? Also in response to the tribal requests for access to the site on the days before and after the summer solstice, the Forest Service has told the tribes to conduct their religious ceremonies after 9:00 p.m. and to finish by 6:00 a.m. (Hirschfelder and Molin 1992: 178).

Because of the influx of New Age tourists, the Forest Service developed a plan (without any discussion with Native Americans) for improved access to the site (Dawson 1994). The Forest Service's scheduled "improvements" included a new parking lot for thirty cars, an improved two-lane road, which would end just thirty feet from the edge of the wheel, and a 2,000-square-foot visitor center near the wheel (Price 1994: 262). In reaction to this plan, the Medicine Wheel Alliance suggested that a zone around the wheel, two and a quarter miles wide, should be established as a preserve, the visitor center (with a replica of the wheel) should be located at least a mile and a half from the site, and the only access to the site should be a walking trail a mile and a half long (Price 1994: 263). Perhaps the

most controversial "improvement" was the Forest Service's plan to build a ninety-foot-long viewing platform next to the wheel (Price 1994: 262). These proposals raised the following questions, which were seriously debated by government officials: Will Indian religious ceremonies become tourist attractions as the "price" of freedom to practice their religion at a government-owned sacred site? Should the Forest Service erect a comfortable viewing platform so that non-Indians can watch the religious ceremonies? While these questions may at first appear "sensitive" to Indian needs, the greater issue is whether these questions and the perspectives they represent should even have been considered. After all, if St. Patrick's Cathedral in New York City were a government property and the Catholic clergy and Catholic laymen had to apply for permits to hold a mass at the site, would they be treated in the same way that Native Americans have been treated at Medicine Wheel? Would the idea of a viewing platform or bleachers at St. Patrick's seem bizarre? Native Americans have questioned whether the government is applying the same standard for the preservation and protection of all sacred sites, or whether Indians sites are being treated differently.

The Forest Service, by trying to provide access to everyone, seemed to have forgotten that Medicine Wheel has been and still is a Native American religious site. Medicine Wheel, like Stonehenge in England, has attracted crowds of New Age adherents. At Stonehenge, both Druids and New Agers would like more access to the site (Bender 1992). With multiple groups interested in these sites, government managers at both Medicine Wheel and Stonehenge continue to debate how to interpret these sites to the public. At Medicine Wheel, should the site be interpreted as just a Native American sacred site? Or should there also be an interpretation that includes beliefs by non-Indians that this site has "earth energies" and other powerful forces? Even if both interpretations of the site's importance are presented, should they be given equal weight? Is the original religious significance of Medicine Wheel and its archaeological importance demeaned or undermined if all voices are given equal weight at Medicine Wheel?

Northern Cheyenne elder, William Tallbull notes, "if you go to see a Sacred Site, remember you are walking on 'holy ground,' and we ask that you respect our culture and traditions" (Thomas 1994: 239). The Medicine Wheel Alliance has tried hard to convince the Forest Service to be sensitive to Native American religious needs and not give equal weight to all other interested parties. The Medicine Wheel controversy is not over, but some agreements have been reached. By 1994, the Forest Service had closed the last segment of the road to the wheel so that visitors now have to hike a mile and a half along a trail to reach the site (Thomas 1994: 237). The viewing platform was never built. And in 1999, a new visitors' center was opened about fifteen miles east of the site (Cox 1999: F1).

In 1996, the Forest Service approved a new management plan for Bighorn National Forest, which created an 18,000-acre "area of consultation" around the Medicine Wheel; the plan requires that the Forest Service consult with Native Americans before approving any activity within the protected zone (Arrillaga

2000: E01). This move is certainly supportive of Indian religious rights. However, the logging industry sees this plan as too restrictive and as hampering its profits (Arrillaga 2000: E01). Consequently, lawsuits have been filed by the logging industry, and the issue of protecting Indian sacred sites will again be decided in the courts.

Should the preservation of sacred sites be at the whim of politicians?

Case study: Petroglyph National Monument, New Mexico

Petroglyphs are engravings on stone, sometimes called "Rock Art" (figure 14.3). Petroglyphs are created by "pecking, incising, carving, scratching, or abrading" the stone (Thomas 1994: 66). Native Americans often regard petroglyph sites as sacred. In 1990, the United States Congress established Petroglyph National Monument in order to protect over 15,000 petroglyphs plus more than 300 other archaeological sites, including building remains, cave dwellings, and Indian campsites (National Park Service 1996). Some of the petroglyphs were created as long ago as 1000 B.C. but most appear to have been made between A.D. 1300 and 1680 (Noble 1991: 186). The monument encompasses about 7,000 acres in Albuquerque, New Mexico (Galvin 1997).

The dramatic array of petroglyphs which make up the site was once on the western border of Albuquerque, but it is now a part of the ever-expanding met-

Fig. 14.3. Petroglyphs at Petroglyph National Monument, Albuquerque, New Mexico.

ropolitan area. Unfortunately, local, state, and federal politicians would like to reclaim some of the land from the new national monument. Senator Peter Domenici (Republican, New Mexico), one of the original supporters of the creation of Petroglyph National Monument, ironically introduced legislation to remove eight and a half acres from the monument so that an extension of a six-lane highway, called Paseo del Norte, could be built through the site (Wehrman 1997: A6). The debate has been intense. Archaeologists and Native Americans agree that the Petroglyph National Monument is significant, and they are working to protect it. A coalition of archaeologists, preservationists, and environmentalist, including the Society for American Archaeology, the National Trust for Historic Preservation, the National Parks and Conservation Association, and Friends of Albuquerque Petroglyphs, have opposed the legislation (Craib 1997). Developers and the former Albuquerque Mayor Martin Chavez (1994–98) support the highway extension and view the highway as critical to proposed new residential developments west of the monument (Wehrman 1997: A6). Representative Bill Richardson (Democrat, New Mexico) even suggested a land exchange with the Indians, an exchange that would give them land elsewhere in exchange for the loss of land at the sacred site (Hartranft 1996: A1). The land-exchange idea demonstrated a clear lack of understanding regarding the significance of this site and the importance of this cultural landscape to Pueblo Indians. However, another former mayor of Albuquerque, Jim Baca (1998–2002), is on record as opposing the highway. Baca opposed the highway because it won't solve the traffic problems, "it has few direct beneficiaries," the cost will divert funds from existing transportation needs, and the highway will undermine attempts to create progressive approaches to growth management (Baca 1997).

Environmentalists and preservationists are concerned about the precedence this bill would set for carving up national monuments, national parks, and federally protected sacred sites. Denis Galvin the deputy director of the National Park Service, in his 1997 statement to the U.S. Senate regarding the proposed highway, summed up the problem of a legal precedent:

> Removing land from an area that has been recognized as important to this nation's heritage for the construction of a freeway or other use to accommodate strictly local needs creates a precedent that could become costly within the context of our National Park System. It sets us at odds with the original intent for establishing these areas—the determination that these resources are nationally significant. (Galvin 1997)

Interior Secretary Bruce Babbitt opposed building the proposed road (Paseo del Norte) through Petroglyph National Monument (Wehrman 1997: A6). However, similar to the Mount Graham case, a rider was added to a larger bill, and President Clinton did not veto the rider. In 1998, Clinton signed into law an amended bill that took the contested eight and a half miles out of the national monument and gave it to the City of Albuquerque (ABC News 1998). By signing

the enabling legislation to allow the project to go forward, President Clinton created a legal precedent, and any federally protected sacred site is now potentially at risk.

And what about the religious needs of the Native Americans who still worship at Petroglyph National Monument? Why are the short-term-investment interests of developers taking precedent over the cultural and religious use of a site that has been ongoing for hundreds of years? Where is the land ethic for culturally and religiously sensitive land-use planning and growth management? Despite the federal legislation, the issue is unresolved. Even though the Albuquerque City Council voted 7 to 2 to build the highway extension, the road was not built because the city lacked the funds (the Sacred Alliance for Grassroots Equality, formerly the Petroglyph Monument Protection Coalition, personal communication, June 9, 2000). From 1998 to 2002, Albuquerque Mayor Jim Baca supported the protection of the petroglyphs and opposed the highway extension (Paseo del Norte), but unfortunately he lost the November election to former Mayor Martin Chavez, who enthusiastically supports the construction of road (Salem 2002: 1). In this post–September 11 recession economy, will the new mayor be able to raise the funds for this expensive highway extension? The Petroglyph National Monument has been temporarily protected by economic circumstances, but the fight to save the sacred site still continues, as does the threat to destroy it.

Politics, economics, preservationists, and Indians

Case study: Mount Shasta, California

Mount Shasta, in northern California, is considered a sacred site by many tribes, including the Wintu (DuBois 1935). The Wintu believe that Mount Shasta is home to supernatural animal beings, who possess benevolent spiritual power (Theodoratus and LaPena 1994: 27–29). However, a proposed ski resort threatened the sacred site. Many Native Americans protested this desecration, but, unfortunately, their voices carried little weight because there were no federally recognized tribes involved in the dispute. During the 1950s, these California Indian nations were "terminated," meaning that their status as legally recognized tribes was ended by the federal government, and the Indians were expected to assimilate. In spite of a lack of federal recognition, Native Americans, together with preservationists, anthropologists, and environmentalists, worked to try to save Mount Shasta.

After an avalanche in 1978 destroyed the ski resort on Mount Shasta, the Forest Service took bids for a new resort and in 1984 awarded the rights to build a new, larger ski resort to a former Forest Service employee (Barnum 1998: A21). After years of protests, lawsuits in 1991 halted the development plans (Philip 1994a). In March 1994, Mount Shasta was determined eligible for the National Register because of its Native American cultural and religious significance (Silver

1994: E1). It appeared that the sacred site might be protected by this preservation designation. However, National Register designation cannot totally stop development, but it may slow it down. A landowner can sell or destroy a designated property if no federal funding or special permits are involved. If the owner is requesting discretionary permits or accepting federal funding, then the owner may have to deal with numerous layers of state and federal bureaucracy in order to comply with preservation laws before legal permission is given to destroy a designated property. This process can be very time-consuming. Unfortunately for Mount Shasta, the protection was short-lived. Economic and political groups successfully lobbied to have the designation rescinded. In November 1994, Jerry Rogers, the official in charge of the National Register, reversed the March 1994 decision, which had listed the whole mountain (Philip 1994b: A1). The listing was changed to include only a site known as Panther Meadows and everything above 8,000 ft. Rogers justified his action because he believed that the rest of Mount Shasta "is now a highly manipulated environment whose historic appearance has been altered again and again" (Philip 1994b: A1). While the mountain has indeed been altered from a Western perspective, Native Americans still view it as a sacred site. This is a prime example of what happens when the question of Native American significance is weighed against non-Indian economic and political interests.

The sacred sites on Mount Shasta were not doomed. Native Americans and allied groups continued their protests. In February 1998, the federal supervisor of Shasta Trinity National Forest recommended to the Forest Service that they reject the controversial twenty-two million dollar proposal to build a ski resort on the sacred sites (Barnum 1998: A21). In August 1998, the Forest Service revoked the permits for the proposed ski resort (Hubert 1998). Bob Roberts of the California Ski Industry Association said that the association agreed with the Forest Service decision to revoke the permit, noting that "the demand for another ski resort in this part of the world is pretty thin" (Hubert 1998: A28). Economics has always played a primary role at Mount Shasta. Economic considerations were a major reason to grant the original permit in 1984, to rescind the National Register designation in 1994, and finally to revoke the permit in 1998. But by constantly protesting and keeping the outcome in question, the combined efforts of Native Americans, environmentalists, and anthropologists also may have played a role in saving this sacred site.

Archaeologists, preservationists, and Native Americans work together and win

Case study: Battle to save Serpent Mound, Ohio

Serpent Mound is a religious "effigy mound" built by Indians at least 1,000 years ago. No artifacts have been found within the mound, so it is difficult to date. Adena sites have been found nearby, but "the scale and complexity of the monu-

ment seem more consistent with the Hopewell culture" (Coe, et al 1986: 48). In 1996, two samples of wood from Serpent mound were radiocarbon-dated and yielded a date of ca. A.D. 1070, which suggests that the mound was built by people from the Fort Ancient culture (A.D. 900–1600), and not by the earlier Adena or Hopewell peoples (Archaeology Magazine 1996: 16). However, more wood samples are needed from diverse locations in the mound, especially from the base of the mound, before a new date can confidently be assigned.

Serpent Mound, which is in western Ohio sixty-five miles east of Cincinnati, is in the shape of an undulating snake. Although the specific purpose of this effigy figure is unknown, the snake appears to be trying to swallow an oval mound near the snake's mouth, which many scholars have interpreted to be an egg. In A.D. 1066, Halley's comet was visible around the world. Some archaeologists have suggested that if the Serpent Mound was built by the Fort Ancient people ca. A.D. 1070, then the "egg" might be a representation of Halley's comet, and the serpent's body might be the fiery tail of the comet (Thomas 1994: 133). However, most archaeologists still view the mound as a representation of a serpent.

In the early 1990s, Serpent Mound was endangered by a proposed upscale residential development. The developer's proposal called for damming Ohio Brush Creek in order to create a lake for a housing development (Cedar Lake Resort). However, the proposed dam would flood numerous archaeological sites, and the artificial lake would potentially erode the bluff on which Serpent Mound is located (Albrecht 1993: 1A). In 1993, the National Trust for Historic Preservation listed Serpent Mound as one of America's most endangered sites and provided national visibility for this threatened site (Lafferty 1993: 1B). Local and county politicians and businessmen supported the residential development because they believed the project would be an economic asset to their county, which in 1993 had the highest jobless rate in Ohio (Albrecht 1993: 1A). The Ohio Council for Native American Burial Rights/Ohio Indian Movement as well as various state and national archaeological, historical, and environmental groups protested the project (Lafferty 1994a: 1C). In February 1994, the Ohio Environmental Protection Agency refused to issue a permit to build the dam, adding "there are no modifications that would make a dam proposal on this stretch of the Ohio Brush Creek acceptable" (Lafferty 1994b: 1A). The project, which was supported by local businessmen and politicians, was defeated through a combination of local, state, and national partnerships that included Native Americans and archaeologists as active participants.

Conclusion

Preservationists, archaeologists, and planners within state and federal agencies should meet with American Indian religious leaders to discuss how to preserve or to develop sympathetic joint use of sacred lands. They should also meet with representatives of tribal governments, understanding that these political leaders

may not always agree with the traditional religious leaders. This is not unlike observing a Republican-controlled Congress and a Democrat-controlled White House, for all societies have their factions.

Some Indian nations have established Tribal Historic Preservation Offices. These tribal agencies may include both Indians and non-Indians, and they frequently evaluate applications and other inquiries regarding archaeological sites and sacred sites. In some cases, they play a vital role as liaisons between government agencies and the tribal government. However, as with any government agency (Indian or non-Indian), they are answerable to the political leaders. Non-Indian archaeologists Kurt Dongoske and Roger Anyon have experienced firsthand some of the difficulties and complexities of the relationship between the Tribal Historic Preservation Office and the Tribal Council. Dongoske and Anyon note that in the case of the Zuni and Hopi nations, the final say on any issue ultimately belongs to the Tribal Council, not the Tribal Historic Preservation Office or the traditional members of either nation (Dongoske and Anyon 1997).

Indian nations sometimes designate religious leaders to handle all inquiries regarding sacred sites, and some archaeologists work closely with these religious leaders. For example, the Onondaga nation, located near Syracuse, New York, had a specific religious leader who dealt with issues of sacred sites. Chief Paul Waterman of the Onondagas often consulted with archaeologists at Binghamton University and Cornell University, and the archaeologists from these two universities volunteer their services to help the Onondagas.

As discussed in the case studies on Mount Shasta and Medicine Wheel, a sacred site is sometimes important to more than one Indian nation. In both of these examples, the religious leaders and traditionalists from these separate nations worked together for a common goal: saving and protecting sites that were sacred to all of them. This cooperation is also evident in New Mexico. There, cultural resource managers at the state and federal level have addressed the probable impacts to sacred sites by the proposed Fence Lake coal-mining project by involving Indians at every stage of development. The project is located fifteen miles from Zuni Salt Lake, a sacred site for the Zuni, Acoma, Hopi, and Navajo peoples, who all consider the site the home of a spiritual being known as Salt Mother (Kelley and Francis 1994: 174; Zuni People 1972: 205–6; Tedlock 1992: 76–93). Leading to the sacred site are pilgrimage trails. These sacred trails have been used for centuries. The company's proposed transportation corridor to the coal mine could impact the religious paths and shrines (Pacek 1993). There are also numerous environmental issues regarding this strip-mining project. The major environmental concern, though, is the utility company's proposal to pump groundwater for dust suppression at a proposed strip mine twelve miles from Zuni Salt Lake. Two hydrology reports, one by the Bureau of Indian affairs and one by the Zuni Tribe have shown that the proposed pumping could seriously harm and drain the sacred lake itself, but the utility company's hydrology study shows no negative impact on the lake (Neary 2001: A-1). In this ongoing preservation battle, the Indians are united; traditionalists and assimilationists are

working together to preserve Zuni Salt Lake. Four separate Indian nations have put aside their long-term differences to work together to protect their sacred lake. The Zuni have also formed a coalition with various environmental groups, including the Southwest Center for Biological Diversity, Water Information Network, Citizens Coal Council, and the Sierra Club (Berry 2001: 1). This example demonstrates tremendous positive cooperation between Indians and non-Indians in uniting to protect a sacred site. Perhaps this project can be a model for other Indian nations.

In conclusion, the direct and immediate involvement of American Indians in decisions regarding their sacred sites should be an ethical goal as well as a legal obligation for non-Indians. Such an interaction also enables Indians to carry out their own ethical obligations. Furthermore, such an involvement is practical, because it diminishes the possibilities of confrontations, court battles, and negative publicity. Such procedures are more than politically correct. The Bill of Rights in the U.S. Constitution guarantees freedom of religion and a diversity of thought. Ironically, we willingly fight battles on foreign shores to ensure the survival of these ideas. However, to ensure freedom of religion at home, we must encourage its survival in all its manifestations on this continent. Finally, we need to ask these questions: Why are we preserving these sacred sites? Who are we preserving them for? And ultimately, whose culture is it?

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15

Traditional cultural properties and the national preservation program in the United States

Nina Swidler and Michael Yeatts

Introduction

Preservation of places important in history is common to all cultures throughout the world. In 1906, the United States first legislated the preservation of historic and prehistoric places under federal jurisdiction through the passage of the Antiquities Act (16 USC 431–33). The federal government substantially amplified this goal in 1966 through the enactment of the National Historic Preservation Act (NHPA). The NHPA specifically acknowledged that "the spirit and direction of the Nation are founded upon and reflected in its historic heritage," and that "the historical and cultural foundations of the Nation should be preserved as a living part of our community life and development in order to give a sense of orientation to the American people" (16 USC 470 §1(b)(1–2). Among other things, this Act led to the development of a set of four criteria by which places or properties are evaluated for their historic importance to the American public. If a property or place meets the requirements, the property may be regarded as a significant historic resource and listed on the National Register of Historic Places (NRHP). Until recently, the national preservation program almost exclusively reflected the position of the dominant culture as to what was significant in American history. This has begun to change as individual cultural groups, particularly Native American tribes, have sought to have places significant within their own history formally recognized within the national context. This movement has increased recognition of the class of historic property called traditional cultural properties (TCPs).

In the following discussion, we first examine the concept of TCPs. Next, we look at some approaches for identifying and evaluating the significance of TCPs as historic properties, the relationship between concepts of significance and preservation, and why standard mitigation approaches may be inappropriate. Fi-

nally, we provide some general recommendations for incorporating the concept of TCPs into historic preservation programs. This work focuses solely on the concept of the TCP as an entity that must be considered within the framework of cultural preservation driven by the legal requirements of federal legislation. It draws on our experience working for Native American tribes (the Hopi Tribe and the Navajo Nation), and, therefore, the focus is on Native American (tribal) TCPs.

The national historic preservation program

The philosophical basis presented in the NHPA for preserving historic places is broad and can be applied across cultures. However, the specific criteria used to evaluate places as important are biased toward a Euro-American view of history. In order to be considered a historic property, the federal regulations state:

> The quality of significance in American history, architecture, archeology, engineering, and culture is present in districts, sites, buildings, structures, and objects that possess integrity of location, design, setting, materials, workmanship, feeling, and association and
>
> a) that are associated with events that have made a significant contribution to the broad patterns of our history; or
> b) that are associated with the lives of persons significant in our past; or
> c) that embody the distinctive characteristics of a type, period, or method of construction, or that represent the work of a master, or that possess high artistic values, or that represent a significant and distinguishable entity whose components may lack individual distinction; or
> d) that have yielded, or may be likely to yield, information important in prehistory or history. (36 CFR §60.4)

Clearly, the preservation of buildings and places associated with Euro-American persons and events is, relatively speaking, easily accommodated within the criteria of eligibility. Less easily conciliated are the types of places important to Native Americans. Other than archaeological sites, very few Native American historic places are formally recognized and listed on the NRHP. Notably, these archaeological sites are included because they are of interest to archaeologists as scientific resources and *not* because of their historic and cultural value to the descendant communities. This points to a general concern that nonstructural, yet culturally important places to Native Americans or other traditional communities are rarely considered under the criteria of eligibility or listed on the NRHP.

It was not until 1990 that the federal government formally acknowledged that traditional cultures have decidedly different views regarding historic importance

than those embraced by the dominant Euro-American historical paradigm (Parker and King 1990). In 1992, twenty-six years after its initial passage, the NHPA was amended to recognize that "properties of traditional religious and cultural importance to an Indian tribe or Native Hawaiian organization may be determined to be eligible for inclusion on the NRHP (16 USC 470a §101(d)(6)(A))." This recognition greatly expands the scope of the national preservation program.

Much of the archaeological work undertaken in the United States today is done in response to Section 106 of the NHPA. This section of the law requires that federal agencies consider the effects of their actions on historic properties that are eligible for listing on the NRHP (16 USC 470f). Compliance with Section 106 is routinely accomplished through the identification of cultural resources, evaluation of whether the resources meet the criteria of eligibility (as defined above), and subsequent mitigation of project effects on historic properties resulting from the federal action. Because the amended act acknowledged a broader definition of historic properties, it has become necessary to consider and afford TCPs the same level of consideration as routinely given to other historic properties such as structures and archaeological sites.

Identification of TCPs

Definitions

Before you can locate TCPs, you need to understand what you are looking for. The lack of understanding and agreement on what constitutes a TCP can result in poorly designed methods for their location and evaluation. Although federal guidelines recognize that the traditional culture concept can apply to any cultural group, and not to just Native Americans, in practice the TCP concept has become nearly synonymous with Native Americans. This is reflected in the explicit language in the amended act recognizing that places of traditional religious or cultural importance to tribes can be eligible for inclusion on the NRHP.

Tribal participation in cultural resource management activities increased once tribes realized that the TCP concept and the NHPA could be employed to help preserve places of concern. From the outset, however, tribal participation was strongly focused on the protection of religious sites, for which other avenues of protection were, and still are, inadequate. The unintentional outcome of this focus has been a perceived narrowing of the classification of resources defined and accepted as TCPs. Rather than referring to a potentially broad class of sites that are important because of the role they play in cultural continuity, or in defining and maintaining the history of a culture, TCPs have become viewed almost exclusively as in-use Native American religious sites. While most in-use religious sites are very important precisely because of their cultural role, rarely are their historical aspects brought to the forefront. Further, this narrow view of

TCPs has led federal agencies to categorically dismiss or ignore historical sites that do not exhibit an overt religious component. Obviously, examples of TCPs will vary from tribe to tribe, but some more commonly reported properties include resource-gathering areas, places where important events occurred, petroglyphs and pictographs, ceremonial activity areas, shrines, trails, ancestral clan locations, springs, and landscape features that figure prominently in tribal tradition.

Participants

With recognition that a range of properties can be considered to be TCPs, the next challenge is identification. The first step is to determine if tribal groups maintain historical ties to the project area. A variety of sources are available that can guide efforts to identify which tribes to contact to determine ancestral or modern ties to the landscape. In the United States, these include

- The findings of the Indian Land Claims Commission;
- Government Land Office plats;
- Government documents such as treaties or land adjudication records;
- Mission or church records;
- Military histories;
- Offices of the Bureau of Indian Affairs;
- The American Indian Liaison Office;
- Tribal Preservation Program of the U.S. National Park Service;
- State Historic Preservation Office;
- Tribal Historic Preservation Office;
- Census records;
- County records;
- Local or regional museums;
- Tribal governments;
- National Archives;
- College or university anthropology, history, or native studies departments; and
- Published sources such as the Handbook of North American Indians published by the Smithsonian Institution.

In the United States, some tribes have been recognized by the federal government, others are only state-recognized, and some are neither. While the greater implications of this status are beyond the scope of this discussion, suffice it to say that federal recognition status is *not* a prerequisite for tribal involvement in the TCP identification process. The important point here is that although federal recognition may afford a tribe greater visibility to the outside world, and, thus, discerning the concerns of a federally recognized tribe may be easier, nonrecognized groups may have an equally valid role in the process.

Once the appropriate tribal groups are identified, the most obvious way to

locate TCPs is to ask each tribe if they have places of concern within the project area. While identification may seem simple in principle, it can be much more complex in practice. Individuals or tribal organizations that possess relevant historical information need to be identified, contacted, and asked to participate in the study. Existing data sources must be consulted and compiled. Data may be sought from religious, ceremonial, and clan leaders, tribal historians, tribal or community preservation organizations, scholars, publications, academic institutions and museums, or the records of management agencies. But, no matter where the information originates, once collected, it needs to be critically evaluated and presented back to the primary source; that is, the appropriate individuals or group within the tribe, to ascertain its ongoing accuracy and relevancy. After all, the associated culture needs to acknowledge the historical value of the resource to give it validity.

A parallel to the TCP identification process is found in the approaches that historic archaeologists and architectural historians follow. While physical remains may be found and interpreted by an archaeologist, a much richer and relevant understanding of the past and the historical values that may figure into later preservation or mitigation strategies will be obtained from the original occupants or users and their descendants. Rarely are historical sites or structures considered adequately documented without review of historical records, interviews, and other methods of identifying the *broader* value or context of the resources. Documenting the physical remains is only part of the process. Similarly, the values that make a TCP historically significant are those held by the group(s) to whose history they relate. Because these values are often embedded in oral tradition and history rather than in the physical remains, they can be obtained only from group members.

Identification approaches

There are various approaches to structuring the TCP identification process. As we point out, varying rates of success can be anticipated based upon the method used. Common to all these approaches is the involvement of the tribe. However, realizing that the tribe does not necessarily have a monolithic view that all members subscribe to, on all subjects and in all contexts, is important. Like the United States as a whole, it is not at all unusual for central and local governments to be at odds. Further, differences of opinion between political and traditional/religious leaders are common. This disagreement can be acute, for example, if the discussion focuses on the preservation of a traditional place versus the approval of a modern economic or social improvement project. Therefore, ascertaining and selecting individuals or groups to be involved must be undertaken carefully in order to achieve a holistic perspective.

The most commonly used approach is to send a letter to the tribal government describing the project's purpose and location, and requesting information regarding the location of TCPs within the project's area of potential effect. The identi-

fication efforts are then considered complete. Predictably, the results of this type of investigation are, at best, marginal. Often, the tribe does not respond or simply issues a generic response letter. This approach cannot really be considered a reasonable effort to identify TCPs; it is more in the realm of notification. Without direct interaction between the agency, project sponsor, or researcher and potential cultural advisors, and without visits to the project area, little specific information regarding TCPs will be obtained. It is similar to quizzing archaeologists about resources in a project area without letting them set foot in it: some educated guesses can be made, but the specifics are unknown. The fallacy underlying this approach is the belief that TCPs are synonymous with in-use religious sites and therefore will be known a priori. While this assumption may hold true for in-use religious sites, the broader range of cultural resources or historic properties will remain unidentified.

A more effective approach to identification begins with a notification letter, but takes the additional step of scheduling face-to-face meetings with tribal officials and cultural advisors. Presentations regarding the project, including known or previously identified locations of archaeological sites, are made to a group of tribal members who serve as cultural advisors. The advisors are then expected to provide informed responses about the value or significance of the project area or specific places within the area. While better than the first approach, it still suffers from some of the same flaws. Direct interaction with the project area is still lacking, and the people present at the meeting may not be the appropriate, knowledgeable individuals. Like the previous example, it is likely that the broader range of cultural resources or historic properties will remain unidentified. Again, this approach is more in the realm of notification rather than a reasonable attempt at identification.

The most pragmatic approach to TCP identification begins with the notification letters and consultation meetings, but follows up with project visits by cultural advisors and interactive meetings between the project sponsor or researcher and the advisors. This allows for an initial assessment of the project area and, through repeated interaction, the potential for participation by appropriate, knowledgeable individuals. The information collected will be more inclusive of places and properties that retain historical value and, importantly, may also help researchers put the findings of the archaeological survey into a broader cultural context.

Best practices

Building upon this strategy, the approach to TCP identification that has been most successful with both the Hopi and Navajo tribes has been tribal assumption of the lead role in the identification process. Again, this approach can be structured in several ways, depending largely upon land jurisdiction, distance tribal consultants must travel to the project area, time, money, and the extent of tribal interest.

Both the Hopi and Navajo tribes advocate a team approach to TCP identification, whether the project is on or off tribal lands. The most basic component of the team is tribal members, who are considered cultural specialists or experts by the tribe. Another common component and often essential addition to the research team are professional ethnographers or ethnohistorians, who act as liaisons between the project proponent and the cultural experts. While the cultural experts provide pertinent information, ethnographers are more likely to have the technical skills to present the information in a format that is usable in a legal–bureaucratic compliance context. The ethnographers may or may not be tribal members, but, importantly, should be individuals with whom the tribe and cultural experts have established a trust relationship. An archaeologist who can provide technical information regarding physical remains and address issues regarding the scientific approach to understanding the past is the final component of the team. Although we describe the team approach as a triad of operational roles, it is conceivable that one individual, usually a tribal member, may carry out all these functions.

Our experience with the Navajo and Hopi tribes indicates that conducting a thorough survey of the project area is not uncommon for the TCP research team. Sometimes, this can be accomplished simultaneously with the archaeological assessment, but other times it is done separately. It is critical, however, that all participants maintain regular communication with each other on findings, interpretation, and evaluation. The probability of conducting meaningful research is greatly increased once the tribe controls the identification and interpretation of its own historic properties.

The team approach works well with tribes, such as the Hopi and Navajo, which have organized historic preservation offices and cultural advisory teams. However, if you are working with a tribe that is not as organized, it is important to find out in the initial consultation meeting if there are cultural advisors or knowledgeable elders that may be contacted for information. Ask if the tribe has worked with an ethnographer or historian whom they trust. We cannot overemphasize the importance of involving appropriate, knowledgeable individuals. Information about tribal history is often deeply intertwined in the ceremonial knowledge base, and this information is not uniformly distributed among tribal members. In fact, this type of information is often highly guarded because of its esoteric and valued nature, and it may be known only by a single member whose duty is to maintain that information and knowledge of associated places. Without the participation of these knowledgeable individuals, there is no hope of identifying locations. Importantly, this also means that a process to safeguard information from inappropriate uses needs to be developed and mutually agreed upon before any information is given. Sometimes, however, disclosure of information necessary to identify or evaluate a property may be as culturally destructive as physical destruction of the property itself. In these cases, it is highly unlikely that any information will be revealed. In the end, this interactive approach

to identification may take a bigger investment of time and money, but the results will reflect a more holistic appreciation of history.

Evaluation of significance

It bears repeating that when evaluating the significance of a place or property as a TCP, it must be from the standpoint of the culture to which it is integral and done with direct involvement of knowledgeable members of the culture. Without an emic perspective, the full historic significance of the property may not be understood. In addition, because the property still needs to meet at least one criterion of eligibility in order to be considered a historic property by the federal government, knowledge of its historic role in the culture and whether this role is still important is crucial.

Evaluating the significance of a property as a TCP is a more complex endeavor than the common convention used in assessing the significance of an archaeological site. Without consideration of other values, archaeological sites are routinely evaluated as eligible for listing on the NRHP solely for their potential to yield information important in history or prehistory. This cookie-cutter approach can be applied because the quest for knowledge is so broad: virtually any archaeological site can be considered valuable for some scientific pursuit. Thus, later mitigation of effects to archaeological sites can be accomplished using standard archaeological methods for data collection.

The significance that makes a property a TCP, however, derives from the unique role it plays within the context of the culture. An analogy from American history illustrates this concept. While both the Little Bighorn and Appomattox are national battlefields, unique events occurred at each place, and their nomination to the NRHP was based on their individual merits, not just because they were battlefields. TCPs should be similarly considered: their importance is usually associated with a specific cultural or historic role.

For many Native American groups, important events and the players in these events concern deities and spiritual personages. Whether or not these events and players can be *proven* in a physical sense is unimportant if they have fundamentally shaped the culture; from this standpoint, they are real. Often, important places are linked together, and their significance can be understood only within the broader context of tribal history. Furthermore, they are often associated with landforms and features that may not manifest any outward human modification and therefore cannot be identified without the participation of someone knowledgeable about cultural traditions. In one sense, this is not dissimilar to some Civil War battlefields that likewise rarely show outward manifestations of their importance in history, but nonetheless are considered NRHP eligible.

Finally, the ability of a property to yield information must also be examined within the context of how the culture maintains its history. For instance, the Hopi Tribe recognizes that the information that archaeologists recover when excavat-

ing an ancestral site may be of value in supporting or validating their traditional views of history. This information gain, however, needs to be weighed against the value of the site within the belief system of the Hopi culture and the role(s) the site plays within traditional knowledge systems such as ceremonial teaching and storytelling. As with identification, the crucial point in evaluating the significance of a property is to involve closely the individuals or groups that value the property.

Can project effects to TCPs be mitigated?

This is an area of historic preservation that is relatively uncharted. There is a common misconception that if a TCP is within a project's area of potential effect, there is nothing that can be done other than to cancel the project or destroy the TCP. This is predicated on the idea that TCPs are synonymous with religious sites. Sometimes, this may be true, but in other cases, compromises may be worked out. Unfortunately, no one-approach-fits-all method can be proposed because so many variables are involved. Effects to TCPs can only be assessed on the basis of the types and extent of impacts to their historical role, and measures for mitigating effects can only be developed in concert with the people for whom the role is important. Further, impacts have the potential to include aspects beyond just physical harm and include such things as impaired viewsheds or soundscapes and changes to the local ecology.

The relationship between the effects of the project and the reason that the location is significant must be taken into consideration. Assessment of these factors may result in vastly different outcomes for seemingly similar situations. Take, for instance, a construction trench being dug through an area considered a TCP. If the location is an area used ceremonially only once a year, it may be possible that construction at a nonsensitive time of year and reclamation of the area to its previous appearance will not affect the site's significance. If instead, the area is a traditional mineral- or plant-resource gathering location, another form of remediation, such as stockpiling the minerals or revegetation of the area with the native plants, may be appropriate. In the case where an archaeological site is also a TCP, following the standard approach of excavating the site to mitigate project impacts may suffice to recover scientific value. However, this strategy is probably not appropriate to mitigate impacts if the site is valued as a marker on a cultural landscape. If the significance is intrinsic to a specific location, such as the home of a deity or a landmark, there may be no way to mitigate physical impacts; thus, the area needs to be avoided. As with all other aspects of working with TCPs, involving the culture that values the property is vitally important. Establishing an early and trusted dialogue with the affected community will often allow for creative approaches to resolving what otherwise may become showstoppers.

Recommendations

So what do we recommend for those who need to identify, evaluate, and manage TCPs within a project area? First and foremost is early involvement of the groups who may have ties to the area under study. Suggestions for timing include initial scoping meetings for compliance with the National Environmental Policy Act or during Class I archaeological overviews. Because many Section 106 projects are small in scale, the economics of conducting a meaningful TCP inventory are usually not feasible. Alternatively, by conducting large-area ethnohistorical work in conjunction with large, better-funded development projects, a more useful database can be developed from which the small projects can draw. Thus, lead agencies might consider conducting ethnohistorical research in partnership with tribes for the lands that they manage as part of their Section 110 responsibilities (16 USC 470h-2 §110(a)(2)(A)), or equivalent state and municipal ordinances. (Section 110 (a)(2)(A) of the NHPA directs federal agencies to establish a preservation program for the identification, evaluation, and nomination of historic properties to the NRHP, for the protection of historic properties, and to ensure that historic properties under the jurisdiction or control of the agency are identified, evaluated, and nominated to the NRHP.) The call for participation needs to be actively pursued by the lead agency, as many tribes lack the resources and personnel to be proactive. Actually talking to people will likely be the only way to ascertain fully whether a tribe has concerns.

If it is determined that a tribe has ties and concerns in an area, allowing active research directed by the tribe has proven most effective. However, project sponsors and researchers should be aware that not all tribes are organized or prepared to get involved in assessment activities to this extent. Another consideration is whether the tribe resides within or near its aboriginal lands. Understandably, distance may result in faded memories of specific locations. However, casually ignoring or discounting historical land-based ties because the tribe no longer resides in the area is an unreasonable approach to consultation. It must also be recognized up front that this strategy is often time-consuming and cannot be initiated near the end of a project. It generally takes time to develop the trust necessary to establish successful working relationships. An important part of building honest relationships with tribes involves establishing mutually agreed upon means to protect the confidentiality of information from inappropriate uses. It is equally important to ensure that critical data is allowed to be fully integrated into all other cultural resource management and interpretive activities in order for the gained knowledge to play a meaningful role.

When beginning a TCP inventory, be aware that properties can be grouped into two, very general categories: those whose location will be known a priori by a cultural expert and those that need to be relocated through field research. This division may relate to the current use of the site. The specific location of places that are regularly visited, such as shrines, offering locations, and resource-

collecting areas, or places remembered through ceremonial practices will obviously be known. Other places, such as locations of events described in traditional histories and prayers, may be known only generally. In such cases, fieldwork will be needed to pinpoint locations.

When evaluating the significance of a TCP, identifying the role the TCP plays in traditional history is vital. Simply because a site is identified as religious by a Native American group does not automatically make it eligible to the NRHP; its role in the history or maintenance of the culture needs to be asserted. A TCP, like any other historic property, needs to meet one or more of the NRHP criteria for eligibility. It should be pointed out that the 1992 amendments to the NHPA gave tribes the authority to substitute more culturally appropriate cultural resource management regulations on their lands, including revision to the criteria of eligibility. Some tribes are already taking advantage of this option. Thus, following the lead of tribes, development of criteria more appropriate for the evaluation of TCPs may be in the future of the national preservation program. Finally, remember that a resource that may be of scientific interest to archaeologists can play an even more important role in the history and cultural maintenance of a tribe or descendant community.

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IV

Managing valued places

16

Handling the unknown

The expanding role of predictive modeling in archaeological heritage management in the Netherlands

Jos Deeben and Bert Groenewoudt

Introduction

In this paper, we focus on two central themes that are of major importance to archaeologists and heritage managers both in the Netherlands and further afield. The first deals with the Dutch government's views on archaeological significance, valuation, and selection, and how these views are put into practice. The second theme, reflected in the title of our paper, concerns some approaches to assessing what we do not yet know about the nature, distribution, and significance of the archaeological record; that is, sites that are currently unknown. Predictive modeling plays an important role in both of these contexts.

The availability of distribution maps, and an overall understanding of the archaeological record, is a precondition for significance evaluation and for selecting sites and archaeological landscapes for preservation. The ARCHIS (Archaeological Information System) center of expertise, established in Amersfoort in 1989, marked the beginning of systematic work to provide these frames of reference in the Netherlands (Roorda and Wiemer 1992). Since that time, a number of new projects have been implemented to provide continued support for these initiatives, both at a regional and national level.

Owing to a variety of factors, the documented distribution of archaeological sites in the Netherlands is still characterized by a number of misrepresentations and continues to conceal major gaps in our knowledge, gaps that exist in time as well as space (Brandt et al. 1992, Groenewoudt and Lauwerier 1997). The rapid reorganization of the Dutch landscape in recent years poses a particularly acute threat, especially to the unknown (and probably best-preserved) portion of our archaeological heritage.

The discussion below will illustrate how subsoil sampling and predictive mod-

eling can be used to make the unknown archaeological resources more manageable and, a more prominent consideration, in the development of our environmental planning policies. One pragmatic example of such an approach is the *Indicative Map of Archaeological Values* (IKAW) for the Netherlands, presented by Deeben et al. (1997, 2002). This article describes the state of affairs in 1997. The text was updated slightly in 2002.

Dutch archaeology: A subsoil heritage

In a densely populated country like the Netherlands, the archaeological heritage is subjected to major and ever-increasing impacts. It has been estimated that one third of the Dutch soil "archive" has been destroyed since 1950 (Groenewoudt and Bloemers 1997: 119). Land has become such a rare and valuable commodity in the Netherlands that it is difficult to adequately protect and maintain archaeological sites. In many cases, economic interests far outweigh archaeological ones, and attempts to protect and conserve heritage. As a result, choices are being made continuously with respect to both archaeological protection and research.

A major obstacle to adequate archaeological valuation and selection is the considerable lack of knowledge about individual sites, as well as of the archaeological heritage as a whole. In areas where major sedimentation has occurred, such as in the western and northern parts of the Netherlands, the tasks of understanding the existing cultural record and developing responsible strategies for protecting it are made that much more difficult. To a large extent, Dutch archaeology is subsoil archaeology. One of the major, and at the same time the best-preserved, parts of the archaeological heritage is buried under natural deposits or anthropogenic soils, such as the plaggen soils associated with Pleistocene upland areas.

However, when mapping buried sites in the Netherlands, various methods of subsoil sampling have been applied successfully and on a large scale. For various reasons, simple techniques such as coring have proven to be more effective than, for example, more sophisticated geophysical and geochemical methods. Nevertheless, it is clear that the systematic mapping of all subsoil sites and relic landscapes would be prohibitively labor-intensive and expensive. Furthermore, the question must be asked whether finding hidden archaeological sites is the most efficient way to protect them. The answer is, probably not. It seems to make more sense to outline a management policy that not only takes into account known cultural resources but also, and perhaps even particularly, considers the unknown portion of the archaeological heritage (16.1). To do this, predictive modeling is essential. In the discussion below, we outline a number of examples of how this type of modeling can be employed successfully. One precondition, of course, is that we are able to define what is valuable and what is not. For this reason, we shall briefly discuss the concept of "significance" and the way in which the process of valuation and selection is organized in the Netherlands (for more detailed information, see Deeben et al. 1999).

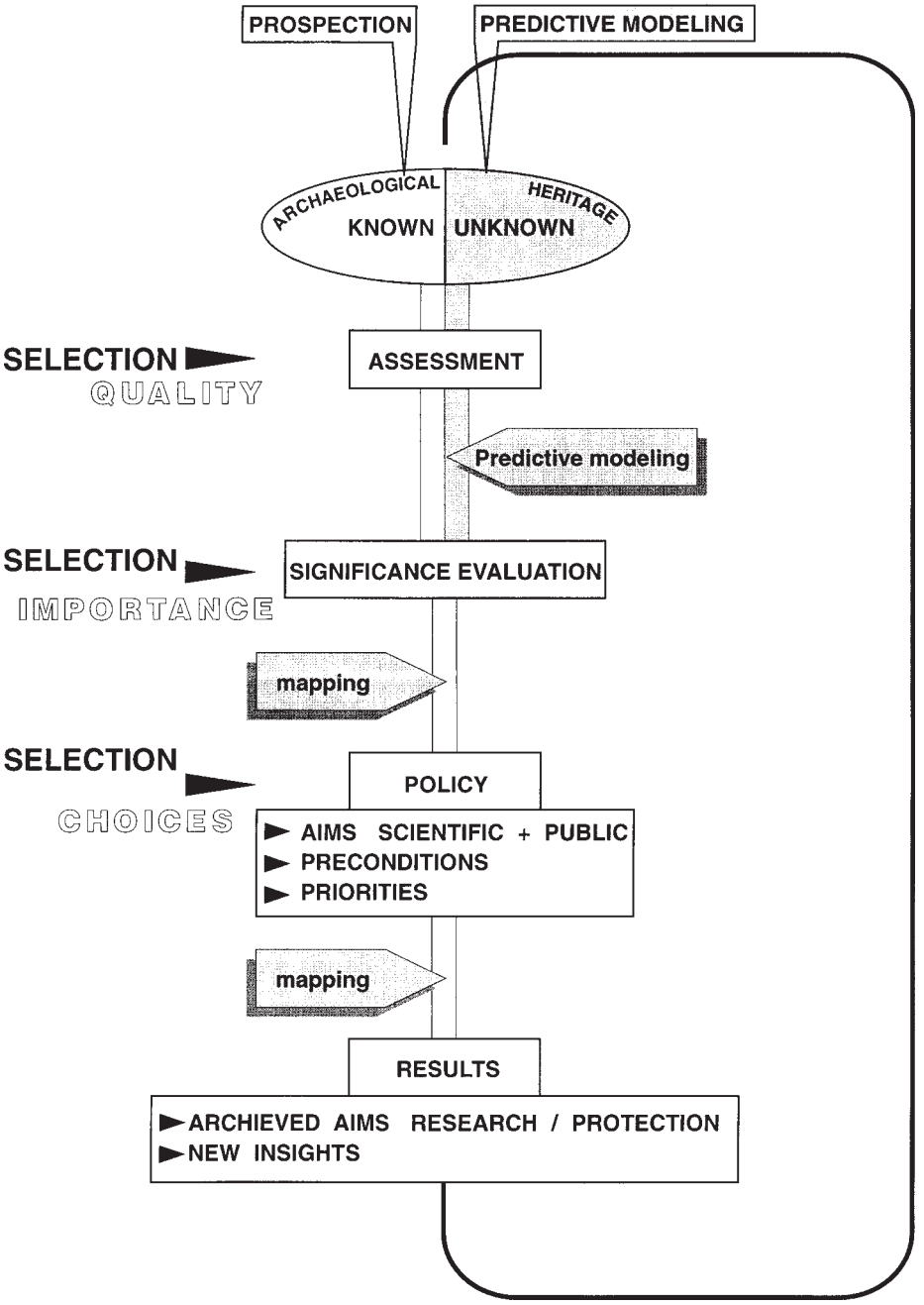

Fig. 16.1. Predictive modeling integrated into the process of valuation and selection.

Value and valuation

The concept of "value" and the qualifiers "valuable" and "valueless" derived from it are by definition clearly relative. Archaeological value does not exist independently; it must be assigned to something. A significance statement is a social construction and can never be absolute or objective. These determinations depend on the way in which the concept of significance is applied, so the dividing line between "valuable" and "valueless" is arbitrary.

Two factors have an important influence on significance statements concerning a site or a relic archaeological landscape, that is, the criteria used and the frame of reference applied to measure the results. Rarity, for instance, greatly depends on the geographical scale within which it is assessed. Using criteria of this kind also makes valuation a dynamic process because new research results influence our ideas about rarity.

To decide whether something is rare or significant, one needs standards, but each quantitative standard is debatable and should be regarded first of all as something of a heuristic device to facilitate dealing with a certain problem at policy level. As mentioned before, an objective assessment of "significance" is unthinkable. What is possible, however, is to base significance determinations on the application of standardized data-collection strategies and a set of explicitly described and verifiable criteria. In this way, valuation at least becomes transparent.

The valuation and selection process

A phased system of valuation is used when sites and relic landscapes are considered important enough to merit protective measures or excavation (Deeben et al. 1999). This iterative system is discussed in more detail below.

In the first place, a site is judged on a basic level, that is, with respect to its "physical quality." To a great extent, the physical characteristics of archaeological remains determine the amount of information that can be extracted from them. It is important that this part of the evaluation be independent of trends to which both scientific perspectives and public perceptions of the cultural landscape are subject. Because the Dutch landscape is highly cultivated, field monuments are scarce; therefore, it has been decided that all clearly visible field monuments are worth preserving as they stimulate the public appreciation of archaeology and archaeological heritage management. The selection of high-quality sites requires information, and in order to acquire this information, a fixed procedure is followed.

The starting point is an overview of all known archaeological resources within the area covered by a specific development, the Standaard Archeologische Inventarisatie (Standard Archaeological Survey, SAI). The basis for this overview is the national database of archaeological sites (ARCHIS and the Centraal

Archeologische Archief; National Archaeological Database, CAA). Linked to this overview is a prediction concerning the presence of as yet undiscovered sites; expert judgments, as well as predictive modeling, play a part in this process (see below). A field survey, the Aanvullende Archeologische Inventarisatie (Additional Archaeological Survey, AAI), follows if it appears that the available data are in some way distorted. In general, this fieldwork consists of a combination of field-walking and coring.

The next step is to select sites that are expected to be well preserved. If doubts remain, a field evaluation, Aanvullend Archeologisch Onderzoek (Additional Field Evaluation, AAO), is carried out to verify the physical quality of the site and to judge its management needs. A field evaluation may consist of intensive coring, digging trial pits, and specialist research, into, for example, the preservation of organic materials.

During the AAO phase, a standardized checklist is completed. It consists of a large number of parameters: conditions and phenomena which make it possible to assess the physical quality of the archaeological remains. Subsequently, an assessment is made in terms of a number of criteria. At this stage, sites are evaluated on the basis of their "scientific importance." The valuation criteria used are rarity, research potential, context or group value, and representativity.

The final result is a valuation: a judgment that makes clear whether or not a site is classified as "worth preserving." Underlying this judgment is the application of a quantitative valuation system (see Deeben et al. 1999, table 2). This quantitative assessment subsequently lays the foundation for a selection proposal that allows the responsible authorities to decide which sites qualify for legal protection or excavation.

The last phase of the selection process involves two main steps: "policy considerations" and choices in the form of "priorities." At this stage, explicitly formulated objectives are the principal aim. This process attempts to take account of not only scientific interests but also the social basis for archaeological heritage management. On a national level, four major categories of heritage have been established (Groenewoudt and Bloemers 1997). These are

- wetlands: areas with well-preserved archaeology in the wet coastal areas;
- limes: the Roman frontier in the central Netherlands river area;
- *essen*: old, archaeologically rich, arable lands on sandy soils; and
- ships: a coherent analysis of the large number of ships that have been excavated in the past.

Predictive modeling

This far we have focused on problems of prospection, as well as the valuation and selection of what little we know. In the next part of this paper, we deal with the unknown part of the archaeological heritage. In "handling the unknown," pre-

dictive modeling has a key role to play. To rural planners, predictive maps make more sense, and have proven to be more useful, than the traditional archaeological distribution maps. In addition, the use of these maps illustrates the parallel development of academic archaeology and archaeological heritage management. In both fields, more landscape-based approaches have gained favor. Maps predicting the unknown part of the archaeological resource are constructed on several spatial levels, including municipal and regional levels, and for the country as whole. Examples illustrating the importance of these predictive maps are provided below. Before discussing them, however, we would like to address a few issues pertaining to theory.

Predictive modeling in archaeology has been defined as a "simplified set of testable hypotheses, based either on behavioral assumptions or on empirical correlations, which at a minimum attempts to predict the loci of past human activities resulting in the deposition of artifacts or alteration of the landscape" (Kohler 1988: 33).

Predictive models are mainly expected to map data which are in fact not yet available, from as yet undiscovered archaeological sites and relic landscapes. Predictive modeling can be carried out in a deductive, as well as in an inductive, way. In the Netherlands, most predictive modeling is undertaken in an inductive way, so models are based primarily on analyses of known site locations within an area. The established correlations between these locations and aspects of the physical landscape, such as soil type, geology, geomorphology, and distance to water, are then extrapolated to areas where no or few sites have been discovered to date. In the western or Holocene portion of the Netherlands, the inductive approach is combined with paleogeographic analyses, that is, reconstructions of the landscape carried out with the help of geological data. One example of this type of approach would be to define an area that could have been occupied during a specific period, but where archaeological remains have yet to be found.

The national level

In 1997, the first generation of a national archaeological "sensitivity" map, known as the *Indicative Map of Archaeological Values* (*Indicatieve Kaart van Archeologische Waarden,* IKAW), was completed (Deeben et al. 1997) (16.2). This map was produced to obtain a systematic synthesis of all known archaeological site locations, and to thereby assist Dutch archaeologists to participate in cultural–historical policy making and environmental planning as a fully competent participant. The starting points for producing the map were the so called "archaeo-regions," archaeological regions defined on the basis of landscape-genetic and environmental features as well as by their occupational history (Groenewoudt 1994, see also Deeben et al. 1997, 1, Groenewoudt and Bloemers 1997, 12). For each archaeological region, a geographical information system (GIS) (Geographical Information Systems) was used to check whether or not relationships existed between site locations on the one hand and soil types and

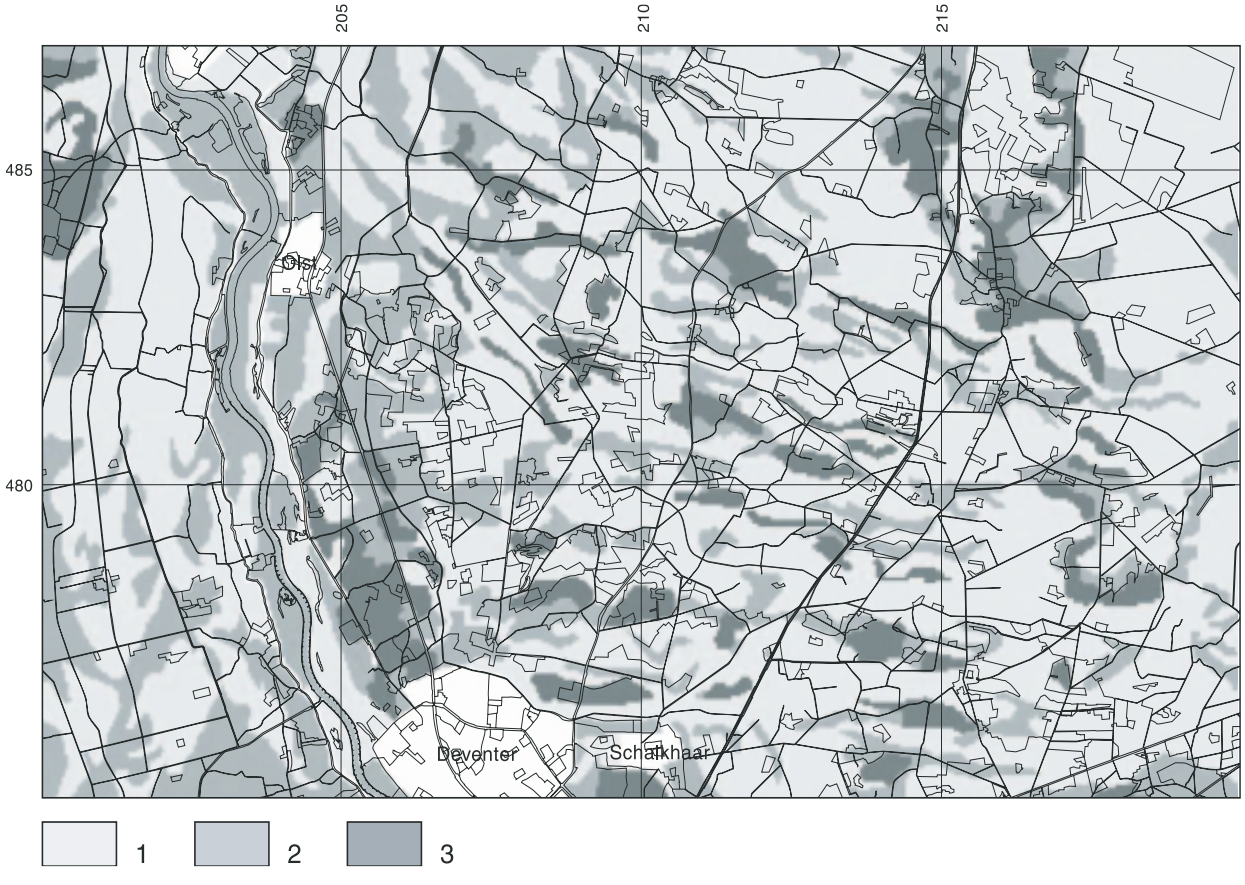

Fig. 16.2. Section of the *Indicative Map of Archaeological Values* (*Indicatieve Kaart van Archeologische Waarden*, IKAW). 1 = low values, 2 = medium values, 3 = high values.

groundwater classes on the other. On the basis of the total area with a specific combination of soil type and groundwater class, the expected number of sites was established. In addition, the observed distribution of sites was calculated. On the basis of the ratio of the observed to the expected number of sites, "indicative" archaeological values were grouped into three classes: low, medium, and high. In general, in areas with low values, the ratio is 0.5 or less, and in those with medium values, the ratio is between 0.6 and 1.5. In areas with the highest values, the observed number of sites will always be greater than 1.5 times the expected number of sites.

This rather physically deterministic approach provides an indication of the relative density of archaeological resources in a relatively simple and quick manner. Soil maps (at a scale of 1:50,000) were chosen mainly for practical reasons, principally because they cover the whole country and are available in digital form. Since soil maps of the Netherlands are based on corings no deeper than 1.2 meters, the IKAW refers only to the top 1.2 meters of the soil. Clearly, to evaluate the presence of more deeply buried archaeological remains, sources other than pedological data will have to be taken into consideration.

Testing predictive models like the IKAW is essential. Therefore, the results of large-scale excavations and trial trenching are used to validate it. This is especially important in areas where scarcely any archaeological data are available. In addition, specialist knowledge is used to improve the map.

In 2001 a second-generation IKAW was completed (Deeben et al. 2002). This map also includes underwater archaeology. Especially, the parts of the map covering the Holocene western Netherlands and the central river area were improved. Because most of the archaeological remains within these areas are buried under thick layers of sediments, geological data were used. Although the IKAW is essentially quantitative, no distinction is made at present between periods and site types. Nevertheless, distinctions of this type will be made in the near future with respect to major gaps in geographical knowledge (see below).

Our ultimate goal is to transform the IKAW into an advisory map, which clearly is something quite different. Advisory maps reflect not only (expected) archaeological resources, but also can highlight areas where archaeological heritage management might concentrate its efforts. Policy-based choices are inevitable if the map is to be used successfully in environmental planning.

The regional level

At a regional level, predictive maps are based not only on soil characteristics but also on topographic, historical, and geological maps. Because the scale of these maps is often larger, parts of the IKAW may be particularly detailed. Furthermore, it is possible to include small-scale disturbances. To select and delimit archaeologically important zones as precisely as possible, research into the archaeological characteristics of specific landscapes is essential. On a regional scale, predictive modeling is used, for example, to assess the archaeological con-

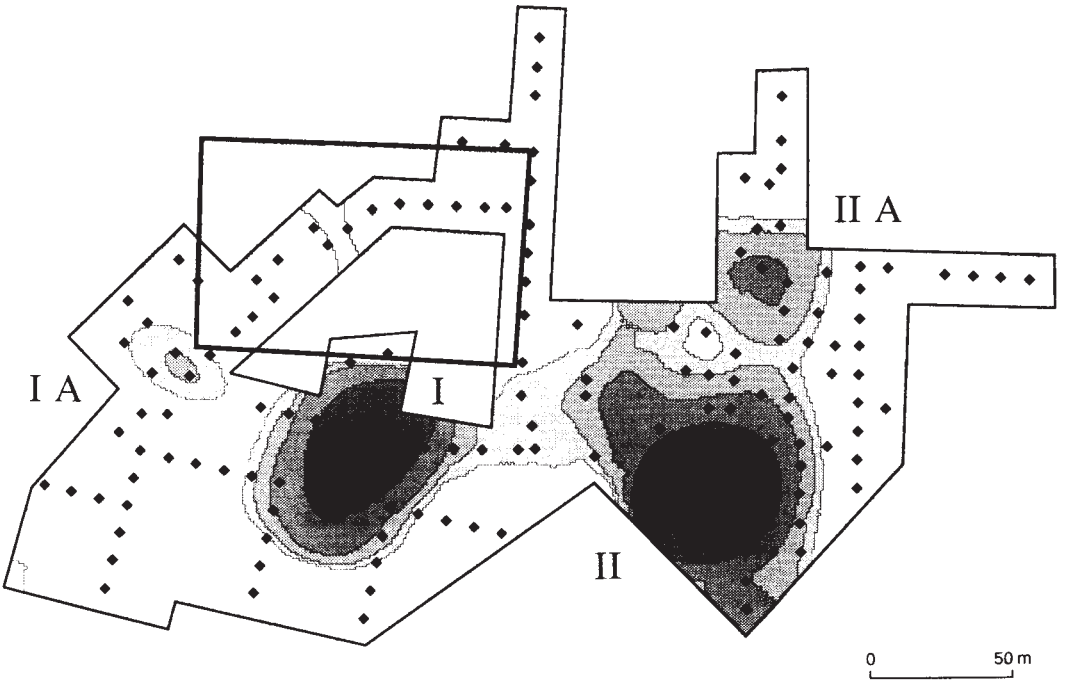

Fig. 16.3. Predictive model of the iron slag distribution surrounding a Roman period settlement near Heeten, the Netherlands. The rectangle marks the excavated area and diamonds represent coring sites.

sequences of the construction of a new motorways and railways as well as nature development and water management activities.

The local level

On a local level, predictive modeling is used, for example, to discover and map sites. Particular emphasis is placed on the anthropogenic plaggen soils (*essen*) in the sandy Pleistocene deposits of the Netherlands. As the result of centuries of manuring, the well-preserved archeological remains in these old plots of arable land are covered by a thick cultivated layer. This situation hampers the discovery of sites, but adequately protects buried sites and relic landscapes in *essen*. On the IKAW, nearly all plots of plaggen soil have a high indicative value and are therefore systematically investigated during field surveys. Debris related to settlement activities preceding the formation of the plaggen soils is easily detectable by core sampling. Recent research near the village of Heeten may serve as an example, and also illustrates how fruitful it can be to integrate core sampling, excavation, and predictive modeling within the framework of scientific research (Groenewoudt and van Nie 1995). Using a twenty-centimeter auger, the area surrounding

a partly excavated Roman-period settlement was investigated. The lowest part of the plaggen soil was sampled and sieved, and the distribution of finds plotted. The distribution maps relating to each category of finds were subsequently developed into predictive models (for the method used, see Wiemer 1995). The results have proven to be essential for the interpretation of the site. Without the combination of core sampling and predictive modeling, the special characteristics and the size of the site (including large-scale iron production activities) would never have come to light (16.3).

Future directions: Improving our frames of reference

Knowledge and knowledge management are indispensable for optimum preservation of the soil as a unique source of knowledge about the past. They are also a precondition for the further development of an archaeological selection and valuation policy. Knowledge and insight (as well as our information gaps) provide the archaeological frame of reference for these selection and assessment policies. Within the cyclical process of archaeological heritage management, new knowledge continually leads to the redefinition of questions and of the way criteria such as rarity and context value should be applied.

As we indicated earlier, the availability of distribution maps and a sense of scientific and intellectual context is an important prerequisite for significance evaluation and selection. Without such frames of reference, it is impossible to effectively conserve our existing soil archive and the cultural remains contained within it. Acquiring general insight into both quantitative and qualitative aspects of the Dutch soil archive is one of the focal points of government policy concerning archaeological heritage management. At the moment this overview is far from complete. Pieces of the puzzle are in the minds of a large number of specialists, and if the general trend towards specialization continues, those pieces will become increasingly smaller and dispersed.

The creation of ARCHIS in 1989 marked an important beginning with respect to a national archaeological record in the Netherlands, as well as a more comprehensive, national understanding of that record. Over the next few years, considerable work will be directed toward building on these efforts, particularly with respect to the provision of better data, valuation criteria, and selection policies. Some of the most important contributions towards this goal are likely to be undertaken by means of the *Kennisatlas Projekt* (*Atlas of Archaeological Knowledge*). As part of this program, our present knowledge and the current state of affairs regarding the protection of archaeological sites will be "mapped" systematically. The aim of this project is to produce national and regional frames of reference in the form of overviews, that is, a series of formalized reviews created in conjunction with their future users. These future users include anyone who is

involved professionally in the management of the archaeological heritage, including those who are primarily decision makers in the field of policy development involving archaeology as well as decision makers involved in environmental planning. These products resulting from *Kennisatlas Projekt* may take the form of maps or of summaries consisting of text or statistics, or a combination of these.

One noteworthy addition to ARCHIS in this context is a new set of data concerning all archaeological excavations that have been carried out in the Netherlands in the past. This record is meant to improve our understanding of the availability of archaeological information in different areas. Excavation data, for example, will be linked to specialized archaeobotanical (RADAR) and archaeozoological (BONE-INFO) databases, which will include both unpublished work and publications that are normally not easily accessible.

Recently a comprehensive inventory of our current knowledge was completed, both at a national level and for each archaeological region (Groenewoudt and Lauwerier 1997). Within this context, knowledge was defined as the availability of published or unpublished research data. These data have been brought together in three different ways: chronologically, thematically, and geographically. The follow-up to the general inventory will consist of describing existing information sources for each archaeological region and further analysis of the research potential within these regions. The IKAW will play an important part in this exercise. By comparing the national map with distribution maps of sites and overviews of systematically surveyed areas, this national review can also contribute to isolating geographical lacunae in our knowledge and focus efforts at filling in these gaps. Afterwards, steps will be taken to consider what options exist for knowledge acquisition within these gaps. In the final analysis, this exercise will help to define future priorities, both in terms of protection and research. It is our view that this information will be translated into research recommendations, such as the compilation of a national research agenda, for all the parties involved in the management of archaeological heritage and archaeological research in the Netherlands.

As we have stated before, neither "knowledge" nor "significance" are objective and invariable. The society of which we are a part clearly guides our thoughts and actions, and therefore the choices we make. It should be emphasized again that today's decisions determine tomorrow's options for research and knowledge acquisition, and therefore also the way in which people will be able to "create" their past in the future. Although we do not know what the questions of the future will be, we must try to make sure that all potential avenues of research remain open. To achieve this, we must learn to handle the unknown. In this context, predictive modeling may have some particularly valuable contributions to make.

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17

Assessing the cultural significance of World Heritage Sites

A case study from Avebury, Wiltshire, England

Melanie C. Pomeroy

Under the terms of the Convention Concerning the Protection of the World Cultural and Natural Heritage, adopted by the General Conference of UNESCO in 1972, it was decided that a World Heritage List should be established of sites considered to have outstanding universal value. It is now twenty-two years since the first sites and monuments of universal cultural significance were inscribed onto the list. As of April 2001, the list included 690 World Heritage Sites (WHS), 529 of which are cultural sites. The list contains some of the most significant archaeological sites in the world, such as the Pyramids of Giza, Stonehenge and Avebury, the Parthenon, and the Great Wall of China. The sites are even more significant in that they are potent symbols of national identity. The intention of the list was to provide a means of recognition, protection, and management of these unique sites and monuments.

Many of the World Heritage Sites are now major cultural tourism destinations, and there is a complex relationship between conservation and the public access obligated by the World Heritage status. Visitor management has become a major issue at the majority of the archaeological sites, whose fragile remains are under threat from increasing numbers of visitors. For example, the sites of Avebury and Stonehenge together attract just over a million visitors annually. Visitors are largely motivated by interests in archaeology and cultural heritage. As pointed out in a recent study of World Heritage tourism (Shackley 1998: 1), their significance is such that a visit to a World Heritage Site should be a major intellectual experience, unlike a visit to any kind of entertainment center or theme park.

Attempting to define the significance of archeological sites on the World Heritage List is not a simple exercise and has major implications for the conservation, planning, management, and targeting of limited resources. It is a serious task,

which needs to be approached with a considerable degree of academic rigor. While there is little doubt that most of these World Heritage Sites are of great significance, it is difficult to define archaeological values in isolation. Moreover, assessments of significance are reflections of modern perceptions and the relationship between the past and present, rather than the embodiment of values assigned to those monuments by their builders.

Until relatively recently the significance of World Heritage Sites was ill defined, other than to consider such sites nominally as having "outstanding universal value." There has been a tendency to assume that the sites and monuments are significant because they are on the list, with little attempt to assess their "inherent value." However, over the last ten years or so, the development of management plans and statements of significance have helped to define archaeological and associated values at an international, national, regional, and local level. This trend is illustrated by a case study from the Avebury WHS in Wiltshire, England.

The concept of outstanding universal value

The principle criterion for placing a site or monument on the World Heritage List is that it have "outstanding universal value," as defined by the 1972 UNESCO World Heritage Convention (UNESCO 1992). Theoretically, inclusion on the list is the ultimate distinction that can be bestowed on archaeological remains. The concept of "outstanding universal value" is described in Articles 1 and 2 of the convention, but no real definition of this term is provided other than to indicate the types of site that can be included within this category of heritage. Instead, the concept is interpreted by reference to six supplementary criteria that are used in defining "outstanding universal value" presented in the *Operational Guidelines for the Implementation of the World Heritage Convention* (UNESCO 1992). The wording of the criteria, first used in 1976, has changed several times since that date; those currently used (see below) were adopted in 1985. The focus of both the convention and the guidelines is that the process of nomination to the list must be very selective.

Criteria for inclusion of cultural properties on the World Heritage List

Under Article 1. The convention, the following are considered as "cultural heritage":

- Monuments: architectural works, works of monumental sculpture and painting, elements or structures of an archaeological nature, inscriptions, cave dwellings, and combinations of features, which are of outstanding universal value from the point of view of history, art, or science;
- Groups of buildings: groups of separate or connected buildings which, because of their architecture, their homogeneity, or their place in the

landscape, are of outstanding universal value from the point of view of history, art, or science; and
- Sites: works of man or the combined works of nature and of man, and areas including archaeological sites that are of outstanding universal value from the historical, aesthetic, ethnological, or anthropological points of view.

A monument or group of buildings or site that is nominated for inclusion in the World Heritage List is considered to be of outstanding universal value for the purposes of the convention if it meets one or more of the following criteria and the test of authenticity. Each property nominated should therefore

- represent a masterpiece of human creative genius; or
- exhibit an important interchange of human values, over a span of time or within a cultural area of the world, on developments in monumental arts or town planning and landscape design; or
- bear a unique or at least exceptional testimony to a cultural tradition or to a civilization which is living or which has disappeared; or
- be an outstanding example of a type of building or architectural ensemble or landscape which illustrates (a) significant stage(s) in human history; or
- be an outstanding example of a traditional human settlement or land use which is representative of a culture (or cultures) especially when it has become vulnerable under the impact of irreversible change; or
- be directly or tangibly associated with events or living traditions, with ideas or with beliefs, or with artistic and literary works of outstanding universal significance.

As defined in the convention, these criteria are too vague, and they do little to promote an objective and precise definition of the terms "outstanding or universal" value. These criteria fail to distinguish types and levels of significance that would identify categories of archaeological and other heritage appropriate for World Heritage status. The lack of definition for the term "outstanding universal value" has led to a significant degree of ambiguity and lack of clarity concerning the significance of sites assigned to the list in the early years, and consequently has generated a group of sites that are not representative (see Cleere 1996). The distribution of cultural properties has grown uneven, both culturally and geographically, since 1978, resulting in a sample that is skewed toward the monumental heritage and religious architecture of Western Europe.

In more recent years, steps have been taken to remedy this imbalance, and a better system of assessment using carefully selected criteria is being developed for nominations to the list. In 1994, the World Heritage Committee adopted a "global strategy" for a balanced and representative World Heritage List. Its aim is to ensure that the list reflects the world's cultural and natural diversity of universal value. Conferences and studies aimed at implementing the global strategy have

been held in different parts of the world since 1994. This strategy introduces a common set of criteria and conditions for interpreting cultural heritage. The World Heritage Committee now also requires each nation state to submit a tentative list of proposals likely to be submitted over the next five to ten years and to consider which aspects of their cultural heritage are already well represented. This should enable the committee to assess a site's "outstanding universal value" in the widest possible context.

In Britain, a working agenda for future site nominations is set out in the government's tentative list (Department for Culture, Media and Sport, June 1999). This document focuses on adding industrial sites and cultural landscapes to the existing inventory of World Heritage sites in the United Kingdom. Moreover, the inclusion of cultural landscapes of international significance since 1995 has widened the definition of heritage to include the associative values of heritage and recognizes the interaction of humans with their natural environment.

Management plans and assessments of significance

With approximately forty cultural sites being submitted every year for inclusion on the list, it has become increasingly important for World Heritage nominations to demonstrate a site's significance in a more sophisticated manner. The situation has vastly improved over the last ten years, since the World Heritage Committee now requires management plans to be prepared for all sites and submitted at the time of nomination. Plans are also required for all sites already included on the list. Moreover, plans need to be in place to meet the strict mandatory requirements that UNESCO is currently introducing. Detailed monitoring reports on the condition of all World Heritage sites in Western Europe are required to be presented to UNESCO by 2004; in Britain, this monitoring is likely to be undertaken by the International Council on Monuments and Sites (ICOMOS), which is the official advisor to UNESCO on cultural World Heritage sites.

The development of management plans and their all-important statements of significance have been part of a wider, worldwide pattern of conservation planning for more than a decade. More specifically, a management plan provides a comprehensive approach to understanding and managing the heritage significance of a site. It is a document that explains in a detailed and explicit fashion why the site or monument is significant or has special merit; how that significance is vulnerable or sensitive to change; and which policies will be adopted for retaining its significance given any future use or development.

All of these issues are closely linked with the concept of sustainability and the long-term preservation of sites of historic and cultural significance. The concept of sustainability is now central to planning and environmental policy at both national and local levels in the United Kingdom. One key element in the development of the concept of sustainability is the ability to define and assess the significance of the site. The importance of this approach to archaeological sites and the

historic environment in general has been stressed by English Heritage (the government's statutory advisor on the conservation of England's built heritage, including archaeology) in a recent discussion paper (English Heritage 1997).

An assessment of significance is viewed as the major part of a management plan. This point is emphasized in the UNESCO guidelines for the production of plans (Feilden and Jokilehto 1993). Assessments should identify the significance of the site or monument both generally and in detail for each of its main components. Similarly, assessments should make value judgments about the degree of historical, biological, geological, cultural, aesthetic, archaeological, technological, social (recreational, public), and other types of significance. A table or grading system to establish the special interest of each area of the site can be used. Since it is difficult to separate out a specific or exclusive archaeological value from associated values such as those listed above, adopting an integrated approach is essential.

In the author's view, the most clearly defined account of the concept of cultural significance and the methods used to undertake World Heritage significance assessments has been developed in Australian documents, such as the Australian National Trust's guide to the development of conservation plans (Kerr 1996). In particular, the Australian ICOMOS Charter for the Conservation of Places of Cultural Significance, known as the Burra Charter, (ICOMOS Australia 1979) has been influential. Together, these documents have influenced constructively the format and context of the Avebury WHS management plan.

The ability to demonstrate the significance of a site via a management plan is becoming increasingly important to the range of agencies involved with the protection and management of cultural sites in the United Kingdom. For example, the National Trust's (largest conservation charity in the United Kingdom) strategic plan emphasizes the goal of ensuring that every property has a statement of significance prepared by 2001. The trust's management plan guidelines (National Trust 1994) take the preparation of a statement of significance as their starting point. Moreover, the Heritage Lottery Fund (HFL) in the United Kingdom, now one of the major funding bodies for the conservation of archaeological sites, requires applicants to demonstrate the heritage importance of a site in the form of a conservation plan (HFL 1998). Applicants for grants are advised that a conservation plan should focus on the significance of a heritage asset; therefore, policies need to be in place to maintain these characteristics. In the context of World Heritage sites, ICOMOS and UNESCO have produced guidance for the production of management plans (Feilden and Jokilehto 1993).

Avebury: A case study

The Avebury WHS is situated on the edge of the Marlborough Downs in northeast Wiltshire, England (figures 17.1 and 17.2). The particularly rich assemblage of archaeological sites there, both visible and buried, provide a vivid record of

Fig. 17.1. Avebury World Heritage Site general location map.

past cultural landscapes and activities. The monuments and features located within this area have exerted considerable visual and cultural influence on the surrounding landscape for almost 5,000 years. Its inclusion on the World Heritage List in 1987 recognized the international importance of Avebury, together with Stonehenge. Although Avebury is part of the single WHS of Stonehenge and Avebury, it is physically distant from Stonehenge, and most of the issues concerning it are separate.

The Avebury WHS has clearly been designed to include six key Neolithic monuments (Avebury Henge and Stone Circle, the Avenue, Silbury Hill, the Sanctuary, Windmill Hill, and West Kennet Long Barrow) (figure 17.3). In this way, the Avebury WHS comprises an archaeological landscape rather than a series of individual sites. As such, Avebury constitutes a relic landscape preserving evidence of a long history of our ancestors' interactions with their environment. In 1994, the World Heritage Committee adopted "cultural landscape" as a subcategory of cultural sites. If Avebury were to be nominated today, it would certainly be classed as an outstanding example of a cultural landscape under category ii (a) of cultural landscapes as defined by the World Heritage Committee at its six-

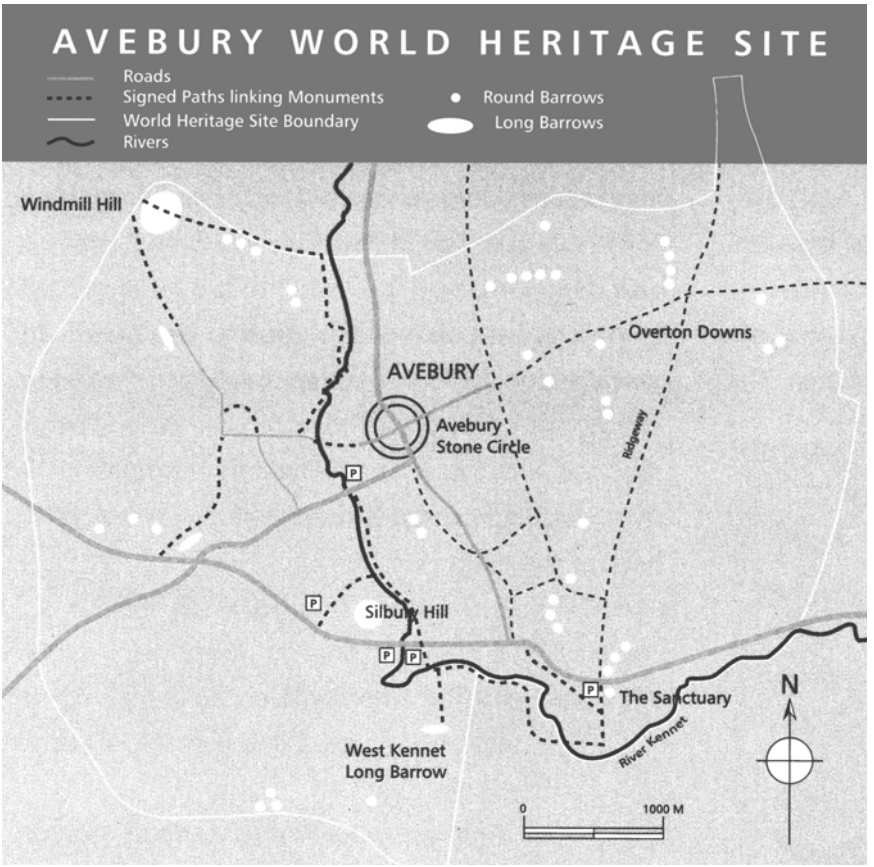

Fig. 17.2. Avebury World Heritage Site boundary.

teenth session (UNESCO 1992): "A relic (or fossil) landscape is one in which an evolutionary process came to an end at some time in the past, either abruptly or over a period. Its significant distinguishing features are, however, still visible in material form."

In response to requirements outlined by UNESCO, English Heritage funded a collaborative project between September 1996 and August 1998 that developed a WHS management plan for Avebury. The WHS management plan has been prepared in consultation with local people and all those with an interest in the management of the area. The preparation of this plan for Avebury was a significant move forward in assessing the character and quality of the WHS cultural landscape as a whole, which is locally cherished and internationally recognized. The plan provides a framework for the holistic and proactive management of the landscape and helps to ensure that the special qualities of the WHS are sustained and preserved for future generations.

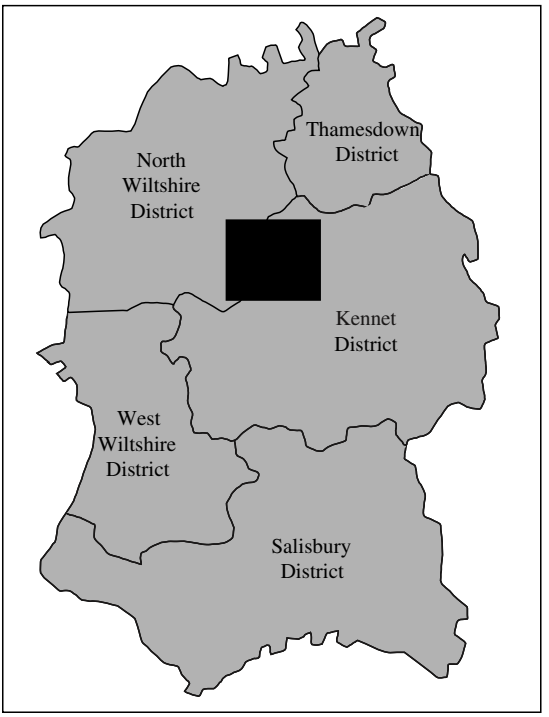

Fig. 17.3. Location of Avebury within Wiltshire, United Kingdom.

Research at Avebury WHS

One of the prominent themes that emerged from the management plan is the value of archaeological research in the area and the necessity for a research framework. Here, the value of a site for research is defined by its potential to contribute to our understanding of past cultures.

Clearly, the state of our knowledge concerning the Avebury cultural landscape is incomplete. There is, for example, enormous potential for discovering new sites and for enhancing our understanding of previously known ones. Although the importance of many key archaeological features has been recognized and studied, the cultural landscape of the Avebury WHS is not particularly well understood or documented. The extant earthworks are easily recognized and can be planned for and managed. However, a wide range of archaeological features and sites exist in the area for which the evidence is less tangible and visually arresting.

Consequently, there is considerable potential for discovering or rediscovering sites and features within the Avebury cultural landscape. The appearance of several new sites such as Beckhampton Avenue in and around the Avebury WHS has highlighted the opportunities for further discoveries here. In addition, a recent

compilation of a research agenda by the Avebury Archaeological and Historical Research Group (AAHRG 2001) for the WHS has revealed numerous gaps, covering all periods, in our current state of knowledge. It has also revealed vast archaeological potential for contributing to the resolution of important new and long-standing research questions. This research agenda has also served to inform the development of the management plan. Although the ICOMOS guidelines for the contents of WHS management plans recommend that research programs should be included (Fielden and Jokilehto 1993: 28 and 39), at the time of writing, it appears that Avebury may be the only WHS to have a comprehensive, published research agenda.

Assessment of cultural significance at the Avebury WHS

The assessment section of the plan identifies the attributes that make the Avebury WHS of value to society both today and in the future. The assessment process improves our understanding of the site, enables informed management decisions to be made, and helps preserve the site's significance. Places or sites that are culturally significant are those that promote an understanding of the past and enrich the present, and which will, therefore, be of value to future generations. The assessment of the cultural significance of Avebury is in many ways the most important and the most subjective section of the plan, as it involves making value judgments that both reflect on contemporary society and affect the information available to future generations for interpreting and understanding the site. These judgments concern the relationship between the past and present, rather than any intrinsic value that the monuments may have had for their builders. Despite the subjective nature of this exercise, it is hoped that the assessment of cultural significance nevertheless reflects a consensus among all individuals and groups involved in drafting the management plan and that, like the plan, it will be valid for at least a generation.

The identification of the cultural significance of the Avebury WHS forms the basis of, and underpins, the whole management plan. This approach should help to ensure that the values that make Avebury important, especially its "outstanding universal value," are not diminished. Avebury's management plan also takes account of a wide range of different values in attempting to assess the site's importance. Sites and monuments may be culturally significant at different levels; some are of World Heritage or international status, others are of regional or local importance. The values of the Avebury WHS have been defined broadly "as archaeological; landscape and conservation; social; economic; and research" (AAHRG 2001: 23). It is recognized that these values overlap considerably, but together they cover the full range of the site's cultural significance. A detailed description of these values, extracted from the Avebury WHS management plan, is presented in the appendix.

Taking it further: The environmental capital approach

The statement of significance for Avebury describes a range of values other than simply World Heritage values; consequently, values of local and regional importance are taken into account. This detailed description of the site's significance also allows associated values to considered. One of the weaknesses of this approach, however, is perhaps the reliance on a series of subjective judgments. A table or grading system to establish the special interests of each area of the site would make the approach more "explicit and holistic," as would an approach using the idea of "environmental capital."

The concept of "environmental capital" has become increasingly popular during the last decade among many organizations, principally in the context of development planning. The underlying premise is that the historic environment consists of assets (including archaeological sites and monuments) that provide constant benefits as long as those assets are preserved. The division into critical, constant, and tradable environmental capital reflects the notion that some components of our collective heritage are more important than others. In this sense, the idea of "environmental capital" provides useful insights into other important concepts such as "sustainability." This approach has been further developed and refined by pragmatic application in the United Kingdom. For example, in *Environmental Capital: A New Approach* (CAG Consultants 1997), the Countryside Commission, English Heritage, English Nature, and the Environment Agency have developed an innovative methodology. This approach does not so much consider heritage assets, but rather the services or environmental functions they perform. Essentially, this approach involves asking some basic questions about heritage management. For example, which characteristics or attributes of the site are the most critical in ensuring its sustainability? How important is each of these and to whom and why? Explicit attention to these issues can lead to the development of management decisions to protect and enhance each of these identified values. Recognizing that most assessments of significance are subjective, the new approach integrates qualitative indicators and subjective judgments.

For the production of WHS management plans and assessments of significance, a simplified version can be adopted that corresponds to the first four steps of the "environmental capital" approach. These are (1) to identify the site or landscape of interest; (2) to determine the physical features and characteristic areas of the site/landscape; (3) for each of these features identify their attributes; and, finally, (4) to evaluate the importance of each attribute (for example, high, medium, and low). In the United Kingdom, this method is currently being developed for use in the management of the Yorkshire Dales National Park and in the emerging WHS management plan for Fountains Abbey and Studley Royal Park (National Trust 2001).

Although this procedure was not used in the preparation of the WHS management plan for Avebury, there are many advantages to the approach. The author

feels that any revisions or amendments to the statement of significance in the Avebury management plan should incorporate an "environmental capital" of approach.

Conclusion

The sites of Avebury and Stonehenge, two of Britain's best-known prehistoric monuments, were nominated to the World Heritage List as a joint World Heritage Site in 1986. The sites, located in Wiltshire and separated by a distance of some forty kilometers, were clearly the foci of ritual and ceremonial activities in the Neolithic and Bronze Age periods. The excellent preservation of archaeological remains in these two areas into modern times has led to their designation as monuments of "international significance." Avebury and Stonehenge between them attract over a million visitors annually; therefore, achieving the balance between public access and the greatest possible preservation of the monuments is increasingly a challenge for site managers. The World Heritage Site management plan for Avebury (English Heritage 1998) and the more recently published management plan for Stonehenge (English Heritage April 2000) incorporate assessments of significance upon which sustainable management objectives are founded. However, these assessments are not as detailed or effective as they might have been had an "environmental capital" approach been employed. Certainly at Avebury, the existence of the management plan has helped managers to focus on a wide range of values associated with the cultural landscape (that is, not just on archaeological values), allowing for a more holistic and sustainable approach to the management of the area. The management plan for Avebury has been designed as an evolving document, and it is to be updated and amended as its various objectives are achieved and as new management and conservation philosophies emerge. The future of the plan may well lie with the more detailed assessment of significance using the eighteen characteristic landscape areas identified in the document and through the use of an "environmental capital" approach.

Appendix

Statement of significance for Avebury: Extract from the Avebury WHS management plan (English Heritage 1998, 23–29).

World Heritage Values

The international importance of Avebury, together with Stonehenge, was recognized by its inscription onto the WH List as site C373 (Stonehenge, Avebury and associated sites) in 1987 on the nomination of the U.K. Government. The nominating document describes Stonehenge and Avebury as the two most important prehistoric monuments in Britain. In form and structure Avebury is quite differ-

ent from Stonehenge, although the period of use during the third and earlier second millennia B.C. is comparable. The Avebury part of the WHS encloses some 22.5 sq km and has clearly been designed to include the six key Neolithic monuments: Avebury Henge and Stone Circle, the Avenue, Silbury Hill, West Kennett Long Barrow, Windmill Hill and the Sanctuary. For a site to be included on the World Heritage List it must meet at least one of six criteria set out in the convention (see above). The inscription of Avebury and Stonehenge onto the List recognizes that together they fulfill the following three criteria:

- Represent a masterpiece of human creative genius;
- Exhibit an important interchange of human values, over a span of time or within a cultural area of the world, on developments in monumental arts or town planning and landscape design; and
- Bear a unique or at least exceptional testimony to a cultural tradition or to a civilization that is living or which has disappeared.

Areas of significance

Archaeological Values

Uniquely Surviving Complex of Neolithic Monuments. The previous discussion has already outlined the "outstanding universal value" of the six key Neolithic monuments that comprise the core of the WHS designation. The discovery and study of these monuments have given testimony to the mortuary ritual and ceremonial life of the earliest farmers in Britain, their physical appearance, lifestyle, society, culture and achievements.

Rich Archaeological Record Spanning more than 10,000 years. The WHS contains an outstanding archaeological record demonstrating continuous human activity in the area for more than 10,000 years. The archaeological sites are not all of outstanding universal value but together they make up the entity that is now the Avebury WHS. As a whole, this rich cultural complex provides a vivid picture of past land use.

Palaeoenvironmental Deposits. Previous studies have identified the critical importance of biological and sedimentary evidence in understanding the development of the Avebury landscape and the interaction between humans and their natural environment throughout the prehistoric period. Excavation work has indicated the very high potential for this evidence in the buried soils and land surfaces preserved underneath the extant prehistoric earthworks, especially at sites such as Windmill Hill, Silbury Hill, Overton and Fyfield Down and the Kennett valley.

The Built Heritage. The built heritage is of great historical interest and contributes to the quality and appeal of the WHS environment. Features of built heritage interest occur in numerous places in the WHS, but predominantly in Avebury Village and West Kennett that are both designated as Conservation Ar-

eas. Many of the historic buildings have been acquired for preservation by the National Trust. In Avebury the buildings, parkland and associated archaeological features which comprise the village form an exceptional and important grouping, and within the triangle of the Manor, Church and Great Barn there are many buildings of considerable visual and historical interest.

Landscape and Conservation Values

Aesthetic and Visual Influence. The six key Neolithic monuments, together with the Overton Hill barrows, the Ridgeway barrows and Waden Hill, are important features that make up the core of the WHS and have exerted considerable cultural and visual influence over the landscape for the past 5,000 years. The WHS can be considered as an outstanding example of a cultural landscape: exhibiting a long and a well-preserved record of human exploitation and interaction with the natural environment.

The Marlborough Downs, and more specifically the Avebury monuments, have been a focus of attention for antiquarians, authors and artists for several hundred years. This attention reflects the major focus on Avebury for the development of Archaeology as a discipline, and also the creative inspiration derived from the area and its landscape. Moreover, the attractiveness of the downland and water meadows are valued greatly by local people as well as tourists. The natural beauty of the area and its importance at a national level has been recognized in its inclusion as part of the North Wessex Downs Area of Outstanding Natural Beauty (AONB).

Ecological and Nature Conservation Value. Ecological interests are well represented in the Avebury WHS with a mosaic of sites of ecological value that are important at a variety of levels from local to international. The area contains nationally important nature conservation and geological interests, reflected in various designations. The remains of lowland calcareous grassland are also considered part of an internationally important ecological resource, as are the several species of bat that inhabit some of the buildings in Avebury. The River Kennett, which rises just west of Avebury, supports an extremely species rich and diverse flora, and has important historic, visual and landscape characteristics.

Social Values

Amenity/Tourism Resource. Avebury has become increasingly popular as an amenity and tourism resource. Current estimates indicate that the site attracts just under 350,000 visitors annually. For visitors in general, the Avebury WHS landscape is viewed in a variety of ways such as: a leisure resource with educational overtones; a sacred or mystical site; a heritage tourism attraction or as a pleasant day out for the family in the countryside. Its national importance as an amenity conservation resource is reflected in its designation as part of the North Wessex Downs AONB; the presence of National Trust permitted routes and a network of public rights of way (including the Ridgeway National Trail); land

managed for open space access by the National Trust; and Guardianship monuments open for public access, co-managed by English Heritage and the National Trust.

Spiritual Value. Spiritually, Avebury is still a "temple" for many people who visit. The site has much symbolic importance to different groups and individuals, perhaps as an icon of continuity in our fast-moving modern world. Paganism may well be the fastest growing religion in Britain, and this is linked with an increasing interest in sites like Avebury as "sacred" places having mystical significance. Pagan religions hold festivals to celebrate nature, as well as the patterns and rhythms of the seasons, and Avebury attracts visitors for such pagan events such as at the Solstice (mid-winter and summer), Beltane (Mayday), Lammas (early August). Although it is currently difficult to quantify, a growing proportion of visitors do visit Avebury for spiritual reasons, as is apparent from the large assembly of people at the site every year at the Summer Solstice.

Local Community Value. Avebury is a living community and working landscape, not a fossilized archaeological park. This is acknowledged as an important value that should not be diminished. The village, in some ways an archetypal English village, has its own characteristic values to its inhabitants and to the district, with its aesthetic appeal, amenities and social centers.

Avebury is very unusual for an archaeological site, with a modern village nested into the prehistoric earthworks. The juxtaposition of the village (with its complex components spanning from Saxon to modern), and wide range of earlier prehistoric features, adds to its attraction and appeal, and gives the site a rich, multi-dimensional focus. The symbiosis of the modern community and the ancient remains is unusual and of great interest: a small English Village, a large prehistoric monument, and a public community of international visitors.

Economic Values

Agricultural Resource. Agriculture is the dominant land use within the WHS and the most formative influence on the landscape we see today. The agricultural land is predominantly classified as grade 2 and 3 (very good to good/moderate quality). The land is mostly used for arable crops, although there is some grazing of sheep and cattle. In addition, some areas of permanent pasture are used as gallops for racehorse training. Some of the areas of farmland are used for game.

Tourism. The revenue generated from tourism at Avebury is an important contributor to the local, district and regional economy. The natural and historic environment of Avebury are key elements to the County and District Councils tourism resource, and an important aspect of economic development as outlined in the local plans. At a local level, tourism provides income and employment for members of the local community and businesses (a pub, restaurant, bookshop and general store). The site raises relatively little revenue, as parking and access to the monuments are free of charge. Some revenue is raised by the National Trust through its gift shop and access to the museum, rents and tenancies. How-

ever, this is used to offset the considerable costs of managing and conserving the monuments.

Research Values

Educational Resource. The unique nature of the monuments and landscape offers excellent visual and recreational opportunities, assisting in education and interpretation within a regional, national and international context. Over the last fifty years Avebury has been visited by a wide range of educational groups, including parties from all over the world. As well as the monuments themselves, the wide range of artefactual evidence from the excavations, housed in the Alexander Keiller Museum, is an invaluable educational resource for a wide spectrum of students and scholars. Both the National Trust and English Heritage are committed to enhancing the value of the site as a formal and informal learning resource and to the better educational use of the (pre) historic environment in general.

Research Potential. The research value of a site depends on the importance of the data, its rarity and potential to contribute to a further understanding of past cultures. For some periods in the past, the Avebury landscape has very high research potential which has been presented in the Avebury WHS Research Agenda (AAHRG 2001). It is acknowledged that our understanding of prehistoric Avebury and its landscape is incomplete and could include the potential for major new discoveries and for sites recorded by antiquarians to be "rediscovered." There is also much scope for improved understanding of the known sites and monuments and enhancing our knowledge of past human behavior in the area.

The integrity of the area holds valuable opportunities for obtaining information in many fields of investigation: archaeology; historical geography; history; biology; ecology and geology. The archaeological sites and landscape also provide outstanding scope for developing research into scientific dating and archaeological prospection.

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18

The bigger picture

Archaeology and values in long-term cultural resource management

Kate Clark

Introduction

In this article, I want to show how an analysis of value or significance underpins not just designation but every aspect of cultural heritage management. In Canada, Australia, New Zealand, and the United Kingdom, there are now well-established methodologies for incorporating value into different stages of cultural resource management (CRM), and it is important to be aware of these.

In the second part of the article, I want to make a case for the importance of understanding fabric or physical evidence—in other words, good old-fashioned archaeology—in establishing significance. An understanding of what is there is often neglected in value-based decision-making methods, with two consequences. The first is that judgments about significance may be flawed, but the second is that as a result, the "values" can come to be more important that the fabric itself, thus ensuring that there is nothing there for future generations to understand and to value in their own way.

Most of the discussion relating to significance that takes place within the archaeological community emphasizes the role of value in protection, that is, in whether or not a site is included in a register, list, or schedule, or whichever national mechanism exists to identify archaeological sites of importance. In other words, attention focuses on defining what is or is not to some degree "outstanding" or worthy of special attention or preservation: What should be set apart for special treatment, funding, or legislation? Where archaeologists have discussed the role of values in cultural resource management, it is in the context of managing archaeologists and archaeological projects. For example, the papers in *Managing Archaeology* (Cooper et al. 1995) do look at values and management, but also focus on designation (see papers by Carman, Darvill, and Startin in that volume) or managing archaeology (see those by Cooper, Brooke, Darvill,

Andrews and Thomas, Locock, and Nixon in that volume), only touching on the management of places. Most of the papers cited in the very useful literature survey done by Bruier and Mathers (1996) are ultimately concerned with initial protection or site selection, with a few touching on mitigation strategies and impact assessment.

There are two problems with this emphasis on using value only to establish what to protect: First, the separation of cultural resources into what is worth protecting and what is not is based on an assumption that what is not designated is not of interest. If we only protect what is designated, then future generations will inherit a heritage consisting of significant dots separated by acres of nonsignificant wasteland where the malls or new housing estates can be built. Drawing hard lines around heritage is equivalent to protecting species but not their habitats. A narrow focus on designation precludes discussion of the wider historic environment.

More importantly, confining the discussion of value to protection assumes that once significance has been identified, then that is the end of the role of discussions about it. Yet Pomeroy has shown in her study of Avebury (this volume) that our understanding of a place and its value continues to be a critical factor in how it is managed well after it has been designated. In an example similar to Avebury, Stonehenge was scheduled as an ancient monument in 1882, and nobody questions its designation today, but controversy over its value rages in the context of a need to decide which type of construction is most appropriate for a new tunnel and where best to locate new visitor facilities. Such decisions will depend upon our understanding of the values of the site as a whole and in its parts, but will hardly be satisfied by reference to the original protection document.

The use of values in cultural resource management

In 1979, a group of members of Australia ICOMOS came together in a small town in South Australia to discuss conservation practice. In particular, they were concerned that the European cultural heritage charters, which governed so much heritage practice, were not necessarily useful in a country where the significance of places was neither obvious nor universally accepted, either because the places were relatively recent or because white practitioners had had their assumptions about significance challenged by Indigenous communities.

The result of their deliberations was the Burra Charter, a set of Australia ICOMOS principles for conservation, based largely on the Venice Charter, which, unlike the original, talks about the idea of place rather than buildings or sites, puts cultural significance at the heart of decision making, and sets out a logical sequence of investigations and decisions which use significance to establish policy and set management frameworks.

Since then, the Burra Charter has been much debated. It was revised in 2000

in order to broaden the definition of significance, and clarify the sequence of decisions, to include social values and multiple values (Truscott and Young 2000: 104–5; ICOMOS Australia 2000). It has now become the basis for much Australian cultural heritage practice (Pearson and Sullivan 1995: 44), and similar principles have been adopted in New Zealand, Scotland, and China (ICOMOS New Zealand 1992; Historic Scotland 2000). The promotion and use of the Burra Charter has stimulated interest in the role of significance in the conservation of buildings and landscapes, and even where a version has not been formally adopted, it has influenced thinking about cultural heritage practice, mainly through the use of conservation plans.

In 1982, the first edition of *The Conservation Plan,* by James Semple Kerr (2000) was published. Jim Kerr was a historian who had been involved in drafting the first version of the Burra Charter. His guidance on conservation planning showed how the understanding of the physical nature of a site could be used to establish its significance, and from there how it could inform policies for retaining significance. Although this original publication was largely based on the analysis of buildings and industrial sites, and did not then include consideration of the wide range of values which we might now look at in a site (particularly social ones), his achievement in creating that link between understanding and management should not be underestimated.

The process of conservation planning is touched on in the first Burra Charter, but is given far greater emphasis in the revision of 2000. Called here the "Burra Charter Process," it stresses the need to make decisions about places in a logical fashion, starting from the understanding of significance.

In Canada, too, the Cultural Resource Management Policy for Parks Canada (Parks Canada no date) includes value as one of the principles for CRM, and stresses the consideration of historic value in actions affecting cultural resources. The obligation created by the National Historic Sites policy is, "to ensure the commemorative integrity of national historic sites . . . by protecting and presenting them for the benefit, education and enjoyment of this and future generations, in a manner that respects the significant and irreplaceable legacy represented by these places and their associated resources" (quoted in Bennett 1995: 1).

The mandate of Parks Canada as an agency is not just to protect sites, but to "ensure their commemorative integrity for present and future generations" (Parks Canada 2000: 5). The service has therefore established a formal mechanism for ensuring commemorative integrity, called commemorative integrity assessments or statements (Bennett 1995: 1–8). The principle is based on the idea of "ecological integrity," which has always underpinned the management of parks, emphasizing not just condition, but a wider idea of health and wholeness. A national site possesses commemorative integrity when

- the resources that symbolize or represent its importance are not impaired or under threat;

- the reasons for the site's national historic significance are effectively communicated to the public; and
- when the site's heritage values are respected by all whose decisions or actions affect the site.

Commemorative integrity is therefore a way by which significance is explicitly used in monitoring the effectiveness of cultural resource management. The emphasis on recognizing value in both interpretation and decision making takes the process of monitoring one step beyond physical condition. Of course it is essential that historic resources are in good physical condition, but this approach recognizes that physical condition is not the only measure of successful cultural resource management. If the values of the site are not effectively communicated or taken into account in decision making, then it is possible that the site can be put at risk or damaged.

England provides a case study of how the Burra Charter principles of significance have spread. In 1997, the Heritage Lottery Fund (HLF) was set up in the United Kingdom to dispense money from a new national lottery. The remit of the HLF to cover a very broad definition of heritage (including archaeology, buildings, landscapes, ecology, museums, libraries, archives, and a range of other types of heritage), combined with the need to "not disturb the quiet equilibrium of our national heritage treasures" (Johnson 1999: 25), meant that HLF needed a mechanism for ensuring that their money would benefit heritage assets. General approaches to managing sites had been developed for World Heritage Sites (Feilden and Jokilehto 1993). However, for other sites, no single existing evaluation technique, whether archaeological assessments, museum collections policies, landscape restoration plans, or feasibility studies (to name but a few of the techniques in use), was appropriate, as many cases involved grant-aiding and it made no sense to have separate approaches from separate professionals (Clark 1999: 27–28). The model of the Australian conservation plan (see table 18.1 for stages involved in conservation planning) was adopted, but modified for U.K. circumstances to reflect the variety of different types of heritage asset being considered, and also the complexity which sites of a greater time depth generated (HLF 1998).

The guidance was introduced at a conference held in Oxford in 1998, which Kerr attended and which brought together practitioners from many different disciplines and professions, ranging from the Dean of Hereford Cathedral to a professional forester. Many people expressed disquiet about conservation planning, arguing that it did not differ from existing practice, or that it introduced an additional bureaucratic requirement into resource management (Clark 1999: 153).

Despite the many initial misgivings expressed at the Oxford conference, conservation planning spread rapidly; initially, it was applied to sites for which money was being sought from the HLF, but other organizations, for example,

Table 18.1. The stages involved in conservation planning

A conservation plan is a document which sets out the significance of a site, and how that significance will be retained in any future use, alteration, management, or repair.

The process includes the following stages:

1) Identify stakeholders;
2) Understand the site—an understanding of the development of the site through time and its survival today, which includes current uses;
3) Assess significance—identifies the multiple values associated with the site, including the cultural values—archaeological, historical, social, community, aesthetic, as well as any ecological or environmental values;
4) Identify how significance is vulnerable—an analysis of what factors have affected the values of the site now, in the past, and may do so in the future;
5) Set aims and objectives for retaining significance—policies for how significance will be retained, including repair or maintenance, to the conduct of archaeology, to appropriate uses, or to the management of the organization; and
6) Implement the plan and use it in decision making.

English Heritage, adopted conservation plans as part of the strategy for caring for their own sites. The National Trust had been independently developing statements of significance for its sites (Russell 1999: 7), but was also adapting its traditional site management techniques to take better account of significance.

Stakeholder values

One of the biggest boosts to the adoption of value-led management has been the dawning realization that you need to involve stakeholders in decision making about cultural heritage resource management. As McManamon and Hatton note (2000: 10), communities residing near or among the locations of cultural resources have important, sometimes critical, influences on the protection and preservation of these resources. For many heritage practitioners, involving stakeholders means telling local people about what matters. Phrases such as "must be told," "must be aware," or "must be educated" imply that stakeholders are there to be told about what matters and why. Yet as Pearson and Sullivan note, "It must always be borne in mind that ultimately there can only be one valid reason for conserving heritage places: They are valued by elements of a community, by a whole community or by society as a whole" (Pearson and Sullivan 1995: 17). The articulation of the values of stakeholders, and involving them in site management, is increasingly being recognized as an essential rather than an optional part of heritage management (Clark 2001a).

Site management planning itself is, of course, nothing new; it has been in existence since at least 1910, when there was a call for complete and comprehensive plans for U.S. National Parks (Sellars 1997: 21). In the United States, the National Park Service has long been committed to management planning as a means of creating a documented, logical, trackable rationale for decisions, which should "follow an analysis of how proposals might affect the values that make resources significant, and the consideration of alternatives that might avoid or mitigate potential adverse effects" (NPS 2001: 50). The need to consult people on site management was recognized in the 1970 Environment Act, which introduced it as a legal requirement of planning, and the NPS is committed to "open and meaningful exchange of knowledge and ideas to enhance the public's understanding of park resources and values and the policies and plans that affect them, and the service's ability to plan and manage the parks by learning from others. Open exchange requires that the Service seek and employ ways to reach out to and consult with all those who have an interest in parks" (NPS 2001: 51).

Methodologies such as REAP (Rapid Ethnographic Assessment Project) have emerged as ways of exploring the complex relationship between people and park resources, and to feed that information into management planning (Low 2002).

One reason why it is necessary to engage stakeholders in site management is that the basic documents, which set out why the site is protected (for example, entry into a register or schedule), often do not (and by definition probably can not) contain all the information needed to make decisions about a site. For example, at Chaco Canyon, a variety of different stakeholder values have to be taken into consideration: those of the Navajo groups associated with the site; the different values of the Pueblo groups, who retain strong affiliations; and the New Age spiritualists, who have their own perception of what matters. Any management strategy has to be sensitive to these values, whatever is set out in the initial park mandate. Even if written planning documents do not reflect these issues, such values do have to be taken into account in practice (GCI 2003).

This distinction between the relatively narrow range of values which justify inscription or designation (for example, as a park) and the wider penumbra of values which successful site management must address is commonplace. Those wider values include the value of other types of heritage asset (for example, ecology, geology, and buildings) or the values of the huge variety of stakeholders. The various different value-led approaches recognize this need for multiple values by ensuring that the management process includes an exploration of the wider values needed to manage a site in addition to the core values for which it is designated. The distinction between the two is precisely why the management process often requires a greater and more explicit exploration of significance than is defined at the point of protection.

Not only do site managers need to deal with a wider range of values than those for which the site has been protected, they also have to face up to the fact that much of site management is about managing conflicting values. In the example of

Chaco Canyon, there is a desire by New Agers to have their ashes scattered at the site, which in turn can offend the sensibilities of traditional groups. The site manager has to find a way or reconciling values, which in this case has meant closing areas of the site. Almost every decision a heritage site manager faces involves some element of conflicting or at least different values.

Access for wheel-chair users is a particularly good example of this; it is entirely reasonable that heritage sites protected through public subsidy are accessible to as many people as possible, and yet the provision of some forms of access can be detrimental to those values for which the site was originally protected. No heritage manager wants to prevent access, but their job is to provide it in a way which ideally respects both the need for access and the other qualities of the site.

The value-led planning process can be used to anticipate this type of conflict and to begin to help resolve it. By articulating the full range of values for the site, potential conflicts can be identified, and the assessment of vulnerability is a useful opportunity to explore how, for example, respecting one value can make another vulnerable. The policies can be used to find ways of reconciling different values.

Value-led planning which takes into account multiple values (including those of stakeholders and the value of noncultural assets) is now becoming an acceptable part of CRM in several countries and has been the subject of an important project by the Getty Conservation Institute (GCI 2000). It is forcing cultural heritage practitioners to work more closely *on* other types of cultural heritage (such as buildings, objects, and landscapes) and *with* other conservation practitioners (for example, in ecology). More importantly, practitioners are having to learn to work more closely with stakeholders who have an interest in sites if sites are to be managed sustainably.

There is some controversy within professional CRM practice over whether value-led management planning approaches such as the Burra Charter process, conservation management plans, or the commemorative integrity assessment offer anything different to long-established traditional management plans. A reading of older style plans suggests that many take the significance of the site at face value or assume that it is too well known to need more than a brief reiteration. They usually proceed from a restatement of the organizational objectives into a series of management actions, again on the assumption that significance is known. It is my own view that this is not value-led planning in the sense that there is an explicit articulation of significance within (and driving) the planning process.

The role of archaeology in value-based management

The question for archaeologists is, what, if any, role should they be playing in this whole process of conservation planning or value-led management? Value-led planning methods are used on all sorts of sites, including urban areas, buildings, and collections. Is there any reason why archaeologists should be involved in

conservation management planning on sites which do not involve buried remains?

While I was writing this article, debate was raging over the future of Mount Orgueil Castle in Jersey. The significance of the castle as a whole was not in question; the site dates back to prehistoric times and was the location of a thirteenth century castle, which was occupied and rebuilt in various phases from then until the present day. The question was one of whether it is appropriate to roof a central area of the castle. Archaeological analysis suggested that the hall and associated buildings were constructed during a campaign of building between ca. 1540 and the 1560s, and that they became dilapidated during the eighteenth century (Dixon and Kennedy 2001: 22). One view was, therefore, that there had been an earlier hall, and it was appropriate to reroof the space. Another archaeological view held that there had not been an earlier hall and that reroofing was not appropriate. The example is used simply to demonstrate how views of what happened in the past can affect assessment of significance and, in turn, decisions about the future of a site.

The Mount Orgueil plan was relatively unusual in that it was written jointly by an archaeologist and an architect, and, therefore, archaeological issues were identified as part of the planning process. Experience in England suggests that the majority of conservation plans for buildings or landscapes are written by firms of conservation architects or planners with little or no access to archaeological expertise, and when such expertise is called upon, it is usually in order to interpret prehistoric aspects of the site.

Yet the whole process of conserving or caring for objects or places should be founded upon an understanding of what is there, in other words the archaeology of the site. Most conservation texts begin with a basic injunction to understand what is to be conserved. For example, "the first operation in any conservation process is to assess accurately the substance of the object to be safeguarded. This may seem obvious, but alas it is not, and by ignoring this operation by considering it to be obvious may result in irreparable mistakes." The author goes on to explain what is involved in that understanding: "What is to be considered the whole of the object to which all operations must be referred? What is the context of the object? What is the history of the object?" (Philippot 1996: 271).

Philippot is not a practicing archaeologist, but an art historian, university administrator, and teacher, and his writings are largely addressed to conservators of art and of historical objects. And yet the questions he asks summarize very neatly the process by which a good field archaeologist might set about understanding a landscape, a building, or a buried site. In other words, the principles of field archaeology, which involve the understanding of time and space and of stratigraphic and contextual analysis, are those which can and should underpin any conservation undertaking.

In the conservation of buildings, at least, a strong link between the role of archaeology and that of architecture had been established by the middle of the

nineteenth century. The work of John Britton, Thomas Rickman, and Robert Willis, who pioneered the understanding of buildings and structures (Pearson 2001: 3), was instrumental in the establishment of organizations such as the French Commission des Monuments Historiques, whose task of classifying historic buildings as well as supervising and funding their restoration was in part generated by the outrage at the damage done to ancient buildings after the French Revolution (Watkin 1986: 386).

Richard Morris, in an important article entitled "Buildings Archaeology" asks how and why it was that, "somewhere between the Wars archaeology and architecture diverged. Like snooker balls clustered and then struck into separate pockets, archaeology, architectural history, art history and associated legislation parted company" (Morris 1994: 16). The mid-Victorian tradition of understanding buildings as a basis for conserving them was rejected, perhaps as a result of the reaction against restoration (with which archaeology is often associated). At the same time, the growing understanding of the performance and behavior of historical materials meant that conservation moved from a humanist to what was seen as largely a techno-scientific pursuit.

Today, an understanding of the archaeology and evolution of a site has become something which, while useful, plays a fairly passive role in management. Caple (2000: 75), for example, notes (emphasis added), "For the purposes of conservation there is a need to focus on the information which can be obtained from studying the object directly, both as a historic document and as an aesthetic entity. *This is particularly important in order that no information is lost or destroyed without record during the conservation process.*"

Archaeologists themselves may be complicit in relegating understanding to a minor role in conservation. Too many practice in a sort of "mitigation ghetto," where often the only role for archaeology in site management or decision making lies in "preservation by record" (DoE 1990: PPG 16 para 13), and the understanding of a site is something to be undertaken as a consequence of threat or loss, "mitigated by data recovery excavation" (Little, this volume). Thus, sites are understood only because they are about to be destroyed. Archaeologists themselves may therefore be responsible for the passive rather than the active view of what archaeology can contribute to conservation.

Another barrier to the better use of understanding in conservation is the lack of genuine interdisciplinary working or communication. In most countries, archaeologists, architects, landscape professionals, ecologists, and planners generally adopt different terminology, methods, and areas of concern, often in caring for the same place. The idea that archaeological approaches to understanding places might form a basis for a common understanding of what matters and why, would be, to many professionals, anathema. Yet where archaeological approaches have informed conservation projects, the results have been beneficial to the quality of the work (Clark 2001b: 4)

Yet there remains a significant problem with the quality and nature of the

information basis on which most conservation decisions are taken. For example, in England, local authority conservation officers deal with applications to alter listed buildings. In a survey of such officers (Oxford Brookes 1999), it was established that over 50 percent of applications did not contain sufficient information to determine the merit of the application, and that searching for further information was a significant cause of delay. It has become normal practice in England to undertake archaeological evaluations prior to making decisions about new developments, but not to undertake such work before changing buildings. The relevance of archaeological approaches to the work of other professions is not apparent.

As a result of this survey, a more positive blueprint for the role of archaeological understanding in the conservation of buildings and landscapes was set out in "Informed Conservation" (Clark 2001a). This publication was designed to address the lack of explicit guidance on the role of understanding in conservation and the continuing poor quality of information on the basis of which conservation professionals were expected to make decisions. It shows how an archaeological understanding of a building or landscape can be used to inform different aspects of cultural resource management, from site management to impact assessment.

Is fabric a dirty word?

The lack of involvement by archaeologists in the wider process of heritage management has another, more sinister implication. This is the spread of the idea that a record provides an acceptable alternative to retaining the object or site itself. As Price notes, "some people go so far as to argue that it is more responsible to create a permanent record of vulnerable sculpture than to waste resources in a fruitless attempt to make the sculpture last forever" (Price 2000: 228). Some of this emerges in the now fashionable discussions of intangible values.

Archaeologists see the physical fabric of a site as the document. Buildings, sites, landscapes, and objects contain stories embodied in their physical evidence which are not to be found in written documents or elsewhere. Those narratives encompass past social processes, events, individuals, and technologies. They tell us of power relations, aspirations, and disasters. A quick glance at the recent history of archaeology shows how our interpretations of those remains will change through time, as our own perceptions and techniques change. This does not invalidate past work; it simply reminds us that there is always more to learn about the past.

If physical evidence or sites are lost, then so is the potential for us to learn more about the past. Of course, archaeology in the form of excavation is itself destructive (although there are now so many more ways of doing archaeology), in the same way as keeping a great painting on display or using a historic locomotive is ultimately destructive. It is part of the price society pays for learning and enjoy-

ment. But the loss of a significant site or object on the grounds that the value can be retained through a record is a poor substitute for keeping the original. This does not mean that sites and places cannot and do not change, or that everything should be preserved for all time. It simply means that in making conservation decisions, we should respect not just the values, but the fabric to which they are attached, and that if we decide to demolish a building, or excavate a site, or not conserve a landscape for other reasons, we do not use specious arguments about keeping the value as a sop to our conscience.

Conclusions

Consideration of the role of value in conservation or cultural resource management is not new, nor is it confined to archaeology. Indeed, the discussion of values is as old as the protection of heritage itself, because the concept of value must underpin or justify the interference with rights or property that heritage protection involves. In A.D. 648, for example, the emperors Leo and Marjorian the August wrote to the prefect of the city of Rome urging them to protect public buildings from destruction as they, "form part of the city's splendor and one should therefore preserve them out of civic conscience" (quoted in Moatti 1993: 148), and because in many cases they were part of the public property. Moatti's overview of the tussles over the remains and treasures of ancient Rome shows how in each new generation, regimes, whether the Christian church, Napoleon, or a Fascist regime, have sought to appropriate or reinstate the physical remains of the past to justify or legitimize their power. Then, as now, each regime sought a contemporary value for the remains of the past.

The literature review by Bruier and Mathers on significance might also have included the work of Alois Reigl, who, writing in 1903 of the modern cult of monuments, asked "What is artistic and what is historical value?" (quoted in Stanley Price et al. 1996: 70–72), noting that it is essential to clarify what we mean by different types of value since that influences the direction of all historic preservation in a decisive way. Reigl is well aware of the subjective nature of values, "It is modern viewers, rather than the works themselves by their original purpose that assign meaning and significance to a monument" (1996: 72).

Yet William Morris, one of the most influential figures in British conservation thought, was less interested in the significance of historic buildings than in what was happening to them in the present and their long-term management. He saw that the biggest threat to historic buildings lay in the very enthusiasm for them, and argued that "those last fifty years of knowledge and attention have done more for their destruction than all the foregoing centuries of revolution, violence and contempt" (Miele 1996: 53).

The debate about significance and value in archaeology in this volume is an important one. It is not a new debate, and some archaeologists feel that perhaps now is the time to move on. Meanwhile, other heritage disciplines are just warm-

ing up to the subject. The Getty Conservation Institute has challenged buildings and landscape conservators to think about the role of value in conservation through the publication of a number of papers (GCI 2000) and through an international project comparing different approaches to the management of stakeholder values in conservation. A recent paper by Byrne et al. (2001), emerging from their experience of working with Indigenous communities, is a refreshing and challenging piece of work that analyzes the attitudes of experts and consultants to significance and poses new and more fluid models for managing and assessing significance. Conservation discourse is moving away from its traditional fixation on the morality of restoration into wider questions about ethical, social, and economic responsibilities.

In this paper, I hope to have shown that rather than moving on, archaeologists need to develop their thinking about value further, and in new directions. It is vital that archaeologists become more aware of value-led planning as a powerful tool for sustaining cultural heritage in the long term. If we are to pass sites on to future generations, we need to recognize that management involves multiple values, different perspectives to our own, and genuine engagement with stakeholders and their concerns.

In coming to terms with the wider debate on value, I also hope that archaeologists will begin to assert their role in sustaining cultural heritage resources of all types. The achievement, particularly of Kerr (1982, 2000) and conservation planning, has been to rebuild the bridge between understanding and management that was shattered in the last century. All cultural resource management must begin with an understanding of what is there, and that in turn, depends upon good archaeology. Archaeologists themselves have to press harder for an active role for understanding and archaeology in all decision making, whether at them time of designation or at other points in the heritage management process. We should not allow ourselves to be relegated to the role of the hyenas of cultural resource management, picking over the bones after the decisions have been made.

The future of cultural heritage management lies in the lessons that ecologists have learned about sustainability: bottom-up as well as top-down approaches, a more constructive dialogue between development and conservation, and a more proactive engagement with wider social and economic concerns. All of this will require a clear understanding of value.

But if archaeologists do not engage with the theory and process of cultural resource management, decisions will continue to be based on what is often a limited understanding of what is there, and as a result will damage the resource needlessly. We will hand on to future generations a historic environment which is the poorer if, despite talking about value, we fail to understand "what" it was that we were valuing.

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Contributors

Jeffrey H. Altschul is president of Statistical Research, Inc. and founder of the SRI Foundation. He has been involved in more than 500 projects throughout North America. Research interests center on spatial analysis and predictive modeling and historic preservation and cultural resources management.

Bonnie Bagley is an archaeologist at Corrales, New Mexico, with the Cultural Resources Management program of Los Alamos National Laboratory. Research interests include the theory and evolution of economies and social manifestations in peripheral areas in Europe, the U.S. Southwest, and the southern High Plains, the complexity of past and contemporary systems, public archaeology, contemporary political economies, and science poetry.

Sherene Baugher is associate professor of archaeology in the Department of Landscape Architecture at Cornell University, Ithaca, New York, and a member of Cornell's InterCollege Programs in both archaeology and historic preservation. She is the pro bono archaeologist for the Onondaga Nation. Publications focus on status, class, and ethnicity in eighteenth- and nineteenth-century America.

W. E. Boyd is associate professor in the School of Environmental Science and Management at Southern Cross University, New South Wales, Australia. He is a geographer and archaeologist with special research interests in long-term environmental change, the history of landscapes, and cultural heritage management, particularly in southeast Asia and Papua New Guinea.

John Carman is affiliated lecturer in the Department of Archaeology, University of Cambridge, Cambridge, U.K. Current research interests include the relations between archaeological heritage management and archaeological theory, together with archaeologies of violence and war. He is co-director with Patricia Carman of the "Bloody Meadows" project on historic battlefields worldwide.

Kate Clark is head of Historic Environment Management at English Heritage, U.K., and is currently working with the Getty Conservation Institute on the role of value in heritage site management. Current interests include the role of heritage in sustainability and the need for strategic research in resource management.

Maria M. Cotter is currently working on several major archaeological projects in eastern Australia, with a strong focus on Indigenous archaeology and heritage management. Other interests include cultural and historical values and their articulation in contemporary environments and landscapes.

Timothy Darvill is professor of archaeology in the Archaeology and Historic Environment Group of the School of Conservation Sciences, Bournemouth University, Bournemouth, U.K. Current research interests include the Neolithic of northwestern Europe, the values placed by society on archaeological materials, prehistoric rock art, and the theory and practice of archaeological resource management.

Jos Deeben is head of the department archaeological values of the State Service of Archaeological Investigations (ROB) in the Netherlands. His special research interests include predictive modeling and the transition from the Late Palaeolithic to the Mesolithic in the southern Netherlands.

Pedro Paulo A. Funari is professor of historical archaeology, Campinas State University, Brazil. He is currently World Archaeological Congress Secretary. Current research interests broadly include archaeological theory, public archaeology, and historical archaeology.

Jane Gardiner is a research assistant and tutor in the School of Environmental Science and Management at Southern Cross University, New South Wales, Australia, and an independent Local Government Heritage Advisor. Her major interests lie in historical heritage in Australia, with a special focus on community engagement and consultation and the role of cultural heritage management in local government.

Jane Grenville is head of the Department of Archaeology at the University of York, York, U.K., and has been a Commissioner of English Heritage since 2001. Her current research interests include English and Japanese vernacular architecture, the importance of the material remains of the past to the present and future society, and the mechanisms of policy making for the historic environment

Bert Groenewoudt is senior researcher at the National Service for Archaeological Heritage in the Netherlands. He has been working on the valuation and selection of archaeological sites, the archaeological potential of buried landscapes, predictive modeling, and the relation between archaeological heritage management and nature conservation.

Ronald Kneebone is a Native American liaison for the Albuquerque District of the U.S. Army Corps of Engineers. Research interests include, in particular,

Middle Classic MesoAmerican spatial organization on the south Gulf coast of Mexico. He is currently responsible for developing multidisciplinary resource management partnerships between the Corps of Engineers and Native American tribes in west Texas, New Mexico, and southern Colorado.

Ian Lilley is a reader in Aboriginal and Torres Strait Islander Studies at the University of Queensland, Australia. He is currently developing a program of basic archaeological research in the eastern islands of the Torres Strait in northern Australia and is also working on theoretical issues surrounding archaeology and Native Title, and diaspora and identity.

Barbara J. Little is an archaeologist with the U.S. National Park Service (NPS) Archaeology and Ethnography program in the National Center for Cultural Resources. Current research interests include public archaeology, evaluation of archaeological places, eighteenth- and nineteenth-century America, and feminist archaeology.

Clay Mathers is a GIS Coordinator for the U.S. Army Corps of Engineers, Albuquerque District, New Mexico. His current interests comprise concepts of space and regional analysis in archaeology, ethnohistory, technological changes in prehistory, theory and practice in heritage management, and the Neolithic–Bronze Age in the Mediterranean.

Melanie C. Pomeroy is an archaeologist, lecturer, and heritage management specialist. Research interests include prehistoric and environmental archaeology, with specific reference to the Greek Neolithic. She has been responsible for the creation a management plan for the Avebury WHS, with English Heritage, U.K., as the Avebury WHS Officer.

Ian Ritchie is an archaeologist for the USDA Forest Service since 1986. He has worked in cultural resource management in five National Forests and one National Grassland in the states of Washington, Oregon, and Wyoming. Research interests include the monitoring of the condition of archaeological sites over time as well as the practical application of heritage resource laws and regulations.

John Schelberg is district archaeologist for the Albuquerque District, U.S. Army Corps of Engineers. Current research interests include settlement systems, low-density lithic scatters, and ground-stone analysis.

Laurajane Smith is lecturer in heritage studies and archaeology at the University of York. Research interests include the intersection of archaeological and management practices with areas of public policy and the cultural politics of identity, community involvement in heritage management and research, heritage tourism,

archaeological ethics, archaeological theory in general, and feminist archaeology in particular.

Nina Swidler has been involved in archaeological investigations in the western United States since 1975 and been employed by the Navajo Nation since 1989. For the past fourteen years, she has worked to facilitate meaningful tribal and community involvement into historic preservation practices and policies.

Joseph A. Tainter is project leader of cultural heritage research, Rocky Mountain Research Station, Albuquerque, New Mexico. His book *The Collapse of Complex Societies* develops a long-standing interest in the evolution of socioeconomic complexity, which led to his current research on sustainability and resource transitions in both the ancient and contemporary worlds.

Gai Taylor is an environmental tour guide in New South Wales, Australia, and Outward Bound instructor. Her work described in the chapter was completed as a final-year undergraduate research project for her Bachelor of Environmental Science degree at Southern Cross University.

Gavin Whitelaw is head of archaeology and anthropology at the Natal Museum, South Africa, and honorary senior lecturer in the School of Human and Social Studies, University of KwaZulu-Natal, South Africa. Current interests include the archaeology of African agriculturists in southern Africa and the depiction of archaeological information in museum exhibits.

Michael Williams is director of the Aboriginal and Torres Strait Islander Studies Unit at the University of Queensland, Brisbane, Queensland, Australia. An Aboriginal man from the Goorang Goorang people of South East Queensland, his academic background is in history and anthropology and his research interests are in the areas of cross-cultural communication, cultural heritage management, and Indigenous knowledge traditions.

Michael Yeatts is archaeologist of the Hopi Tribe and adjunct faculty at Northern Arizona University, Flagstaff, Arizona. In addition to pursuing methodological and theoretical approaches to the better integration of tribal concerns into archaeology, he maintains research interests in prehistoric technologies, ethnobotany/ethnobiology, and cultural resource management.

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